A GUIDE TO EDITRANSLATION SOFTWARE

1991 Edition

Report PL005R1



Harold L. Frohman

Prepared pursuant to Department of Defense Contract MDA903-85-C-0139. The views expressed here are those of the Logistics Management Institute at the time of issue but not necessarily those of the Department of Defense. Permission to quote or reproduce any part — except for Government purposes — must be obtained from the Logistics Management Institute.

LOGISTICS MANAGEMENT INSTITUTE 6400 Goldsboro Road Bethesda, Maryland 20817-5886

DISTRIBUTION STATES PART

Approved for public releases
Distribution United

91 2 11 158

REPORT DOCUMENTATION PAGE

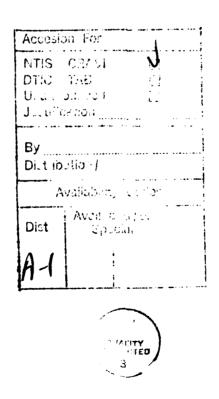
Form Approved OPM No. 0704-0188

Public reporting burden for this collection of information is estimated to average 1 hour per response, including the time for reviewing instructions, searching existing data sources gethering, and maintaining the data needed, and reviewing the collection of information. Send comments regarding this burden estimate or any other aspect of this collection of information, including suggestions for reducing this burden, to Washington Headquarters Services, Directorate for Information Operations and Reports, 1215 Jefferson Davis Highway, Suite 1284, Arlington, VA 22282-4382, and to the Office of Information and Regulatory Affairs, Office of Management and Budget, Washington, DC 20583.

| 1. AGENCY USE ONLY (Leave Blank) | 2. REP | ORT DATE | Ì | 3. REPORT TYPE AN Final | D DATES COVERED |
|---|---------------------------------|--|-------------|--|--|
| | 199 | <u>. </u> | | - Inai | |
| 4. TITLE AND SUBTITLE A Guide to EDI Translation Software, 1991 Edition | | | 5 | . FUNDING NUMBERS C MDA903-85-C-0139 PE 0902198D | |
| 6. AUTHOR(S) | | | | | |
| Harold L. Frohman | | | | | |
| 7. PERFORMING ORGANIZATION NAM | IE(S) AND ADDRE | SS(ES) | | 8 | . PERFORMING ORGANIZATION |
| Logistics Management Institute 6400 Goldsboro Road Bethesda, MD 20817-5886 | | | | | REPORT NUMBER LMI-PL005R1 |
| 9. SPONSORING/MONITORING AGENC | * * | | | 1 | 10. SPONSORING/MONITORING AGENCY REPORT NUMBER |
| Office of the Assistant Secretary of Defense (Production and Logistics) The Pentagon Room 3E808 Washington, DC 20301-8000 | | | | | |
| 11. SUPPLEMENTARY NOTES | | | | , | |
| This report updates an earlier edition published in November 1989. | | | | | |
| 12a. DISTRIBUTION/AVAILABILITY STA | TEMENT | | · | 1 | 2b. DISTRIBUTION CODE |
| A. Approved for public release; di | istribution unlimi | ited | | | |
| 13. ABSTRACT (Maximum 200 words) | | | | | |
| This guide identifies and provides details on 72 commercially available electronic data interchange (EDI) translation software packages. It was developed for use by the Military Departments and Defense agencies as they procure EDI translation software packages in support of the Department of Defense's (DoD's) EDI program for transportation. However, other DoD entities with an EDI program should find this guide useful. This guide assesses the key features of each package, details a list of functions available in a particular software package, and highlights those features required to meet the EDI needs of Defense transportation in specific operating environments. | | | | | |
| 14. SUBJECT TERMS | | | | | 15. NUMBER OF PAGES |
| Transportation; Electronic Data Interchange; EDI; EDI Translation Software; EDI Software | | | Software | 130 | |
| | | | | | 16. PRICE CODE |
| 17. SECURITY CLASSIFICATION 1 | 8. SECURITY CLA OF THIS PAGE | | 18. SECURI | TY CLASSIFICATION | 20. LIMITATION OF ABSTRACT |
| Unclassified | Unclassified | | Uncias | | UL |

CONTENTS

| | <u>Page</u> |
|---|-------------|
| A Guide to EDI Translation Software | 1 |
| Glossary | Gloss. 1-7 |
| Appendix A. EDI Translation Software Vendor List | A-1 - A-18 |
| Appendix B. Vendor Information | B-1 - B-80 |
| Appendix C. EDI Translation Software Functions and Features | C-1 - C- 3 |
| Appendix D. Software Product Survey Results | D-1 - D-12 |
| Appendix E. Selecting EDI Translation Software | E-1 |



A GUIDE TO EDI TRANSLATION SOFTWARE

1991 Edition

This edition of A Guide to EDI [electronic data interchange] Translation Software, 1991 Edition updates and expands the information presented in our previous version published in August 1989. As in our earlier edition, the guide identifies and provides details on commercially available EDI translation software packages. It was created to aid the Military Departments and Defense agencies as they procure software in support of DoD's EDI program for transportation. However, all DoD entities with an EDI program should find the guide useful.

In the guide, we identify a variety of EDI software packages, assess the key features of each package, detail a list of functions and features that could be contained within a particular software package, and highlight those features that we believe are required to meet the EDI needs of Defense transportation in specific operating environments. We also show how to use the guide to select EDI translation software.

We obtained information on the various translation software packages from product brochures and telephone interviews. We have not seen demonstrations of every software package, so we cannot endorse their effectiveness. Furthermore, we did not survey vendors that remarket EDI translation software products or that sell industry-specific (nontransportation) products. As in the preparation of the 1989 edition, some vendors did not respond to our requests for additional information.

The guide consists of a glossary and five appendices. The glossary defines the acronyms used throughout the guide and the terminology used to describe the various EDI software functions and features.

Appendix A lists the EDI software vendors we contacted during the preparation of the guide. The vendors are grouped by the type of hardware required to use the software: microcomputer, minicomputer, or mainframe. In addition, Table A-1 identifies the vendors that were excluded from the guide and the associated reasons.

Both the vendor list and the table provide the vendor's address, telephone number, and point of contact.

Appendix B provides detailed information on each of the EDI translation software vendors identified in Appendix A. It focuses on the products offered by the vendors including the hardware operating environment, software pricing, and third-party networks directly accessed by the software package.

Appendix C identifies 48 functions and features that could be contained within a particular EDI translation software package. It also indicates those functions that we regard as required to meet the EDI needs of Defense transportation in specific operating environments.

Appendix D presents the results of the telephone surveys. The information is categorized by the type of hardware required to use the software: microcomputer, minicomputer, or mainframe. It also provides details on some of the software functions highlighted in Appendix C.

Appendix E lists the steps to be followed when using the guide to select EDI translation software packages.

If you need further information on any of the EDI translation software vendors or the capabilities of their software, you may contact either the person listed below or the vendors directly:

Harold L. Frohman Logistics Management Institute 6400 Goldsboro Road Bethesda, MD 20817-5886 (301) 320-7286 A/V 287-2779/2127

GLOSSARY

DEFINITION OF ACRONYMS

AIAG = Automotive Industry Action Group

ANSI = American National Standards Institute

APL = A Programming Language

ASCII = American Standard Code for Information Interchange

AT&T = American Telephone and Telegraph

BASIC = Beginners All Purpose Symbolic Instruction Code

BT = British Telecom

BTOS = Burroughs Operating System

CICS = Customer Information Control System

CNCP = Canadian National/Canadian Pacific

COBOL = Common Business Oriented Language

CPU = central processing unit

CTOS = Convergent Technologies Operating System

CTX = Chrysler Telecommunication Exchange

DB2 = Database 2

DEC = Digital Equipment Corporation

DOS = disk operating system

DOS/VSE = disk operating system/virtual system extended

DTS = Document Transmission System

DIBOL = Digital COBOL

EBCDIC = Extended Binary Coded Decimal Interchange Code

EDI = electronic data interchange

EDIFACT = Electronic Data Interchange for Administration, Commerce

and Transport

EFT = electronic funds transfer

FORTRAN = Formula translator

FTS = Financial Transmission System

GEIS = General Electric Information Services

GM = General Motors

HP = Hewlett-Packard

IBM = International Business Machines

ID = identification

IMS/DC = Information Management System/Data Communications

LAN = local area network

MB = megabyte

MPE = multiprogramming executive

MSA = Management Science America

MS-DOS = Microsoft disk operating system

MVS = multiple virtual storage

NCR = National Cash Register

PC = personal computer

PS/2 = Personal System/2

QMF = Query Management Facility

RAM = random access memory

RJE = remote job entry

RM COBOL = Rand McFarland Common Business Oriented Language

RMS = Release Management Systems

RPG = report program generator

SCO = Santa Cruz Operation

SQL = Structured Query Language

TCIF = Telecommunications Industry Forum

TDCC = Transportation Data Coordinating Committee

TSO = timesharing operation

UCS = Uniform Communication Standard

VAN = value-added network

VAX = virtual address extension

VICS = Volunteer Interindustry Communication Standard

VLT = variable length translator

VMS = virtual memory system

WINS = Warehouse Industry Network Standard

DEFINITION OF TERMS

Application System Interface. A routine that extracts data from an application system database and creates fixed-length files in the vendor's format for subsequent translation to an EDI format. The reverse process is also applicable.

Automated Purging. A feature that automatically deletes archived transaction set data according to user-specified criteria, such as date ranges.

Automatic Recovery/Restart Capability. A routine that automatically recovers any data being processed and restarts the application in the event of a power failure or a communications failure.

Character Conversion Capability. Translation software that converts a sender's character set to the character set required by the receiver's computer (e.g., EBCDIC to ASCII).

Code Conversion Capability. The ability to convert an EDI standard data element code into a user-unique code.

Compatibility with Encryption and Authentication Package. A translation software package that can operate with an encryption and authentication package.

Communications Software. A software module that automatically dials the communications network and sends or receives EDI-formatted data.

Data Element Delimiter Table. A table of alternative data element delimiters that is maintained for each trading partner, thus accommodating the requirements of different trading partners.

Data Input Screens. A set of screens used to enter data into the translation software package for subsequent translation into an EDI format. (This feature is required when an application system does not reside on the user's computer.)

Error Reports. Reports of outbound or inbound transaction sets that do not comply with the EDI standards. (These reports are usually printed logs of each communications session presented in a non-EDI format easily understood by the user.)

Expandability. The ability to incorporate new functions, such as EDI transaction sets, into an existing translation software package.

Functional Acknowledgment Capability. The ability to send or receive a Functional Acknowledgment Transaction Set that indicates the status of each EDI transaction set transmission to or from a trading partner.

Functional Acknowledgment Reconciliation. The matching of transaction set messages with functional acknowledgments to identify the successful receipt of information by trading partners and the highlighting of unacknowledged transaction sets that have been sent.

Help Screens. On-line screens that provide assistance in the use of specific translation software functions.

Inbound Standards Compliance Editing. The editing of data received from trading partners to determine whether they are in compliance with the EDI standards.

Inbound Transaction Set Reporting. The capability to print inbound transaction sets for audit trail purposes. (The date and time of every message received should be included in the report.)

Input Editing. A feature that permits the user to edit each field and segment of a transaction set as data are manually entered into a system in order to ensure compliance with EDI standards.

Installation Routines. Programs that automatically install translation software packages onto a computer with minimal user intervention.

Internal ID Number Duplication Control. A program that monitors the use of internal business document identification numbers, such as invoice numbers, to avoid duplicates.

Maintenance Support. EDI standard updates and software enhancements provided by the translation software vendor, usually for an annual fee.

Multiple Communications Interface. Translation software that allows communication with more than one telecommunications network, preferably in the same communication session.

Multiple Header Support. EDI translation software that supports multiple envelope headers including ISA and BG, depending on trading partner requirements.

Multiple Users. A feature that permits more than one person to use a translation software system concurrently. (On those personal computers that use DOS, a local area network typically provides this feature.)

Network Identification Table. A table containing network addresses, telephone numbers, and other related information needed to communicate with a trading partner through a telecommunications network.

Outbound Standards Compliance Editing. The editing of data sent to trading partners to determine whether they are in compliance with EDI standards.

Outbound Transaction Set Reporting. The capability to print outbound transaction sets for audit trail purposes. (The date and time of every message sent should be included in the report.)

Segment Terminator Table. A table of alternative segment terminators that is maintained for each trading partner, thus allowing for different communications network or trading partner requirements.

Selective Accessibility. A feature that limits user access to specific screens and functions.

System Entry Security. Features that provide system security through the use of passwords and/or user-identification codes.

Table-Driven Software Structure. EDI data elements and segments maintained in a table structure.

Technical Documentation. A narrative and graphic description of a system that provides technical personnel with sufficient details to "troubleshoot" portions of the

translation software. (A data dictionary, a system flow chart, and all file structures are typically included in technical documentation.)

Trading Partner Profile. A profile of each trading partner that identifies the segments in a transaction set required by that trading partner.

Training. Vendor-offered training sessions that teach how to use their translation software package.

Transaction Set Archiving. EDI-formatted data that are saved on the computer for query purposes or for restoration in the event of a computer failure.

Transaction Set Consolidation Routines. Software that groups transaction sets by trading partner prior to transmission, thus reducing communications costs; if more than one telecommunications network is used, the transaction sets are first grouped by network and then by trading partner.

Transaction Set Correction Capability. The ability to either correct an outbound standards compliance editing error in a front-end operating environment or modify transaction set data prior to transmission. (This capability should be provided in a format that does not require knowledge of EDI standards.)

Transaction Set Sequential Numbering. A routine that either assigns a sequential control number for all transmitted transaction sets for each trading partner or enables the receiver to determine whether a transaction set is missing from the transmission by checking the sequential numbers of inbound transactions.

Transmitted Characters. A report of the number of characters transmitted and the time and date of each transmission for each network. (The report allows the user to reconcile each network's bill.)

Tutorial Package. An interactive, on-line program that guides a user through a prescribed sequence of steps on using a particular translation software package.

Unattended Operations Capability. The ability to program the EDI translation software to automatically perform EDI-related processes such as sending or receiving EDI-formatted data at a user-specified time without operator presence.

User-Definable System Interface. Automated data-mapping procedures embedded in the EDI translation software package that create fixed-length files

according to the user's requirements for subsequent translation to an EDI format. The reverse process is also applicable.

User-Defined Management Reports. Ad hoc management reports that can be created by the user, typically through a report generator embedded in the translation software package.

User-Defined Print Output. A feature that permits the user to define the output format for printing manually entered data.

User Documentation. A nontechnical description of the translation software system and the operation of all system functions.

User Support (Hot Lines). Telephone support provided by a vendor to resolve any operating problems when using a translation software package.

User-Defined Data Input Screens. A set of user-defined screens for entering data into the translation software package for subsequent translation into an EDI format. These screens are presented in a non-EDI format that does not require knowledge of EDI standards.

Version Support. Translation software that supports the current and two previous releases of an EDI standard.

Version Support Table. A table that identifies the version of every EDI standard being used by each trading partner.

APPENDIX A

EDI TRANSLATION SOFTWARE VENDOR LIST

This appendix lists all the EDI translation software vendors contacted during the preparation of this guide. We have grouped the vendors according to the hardware required by their software: microcomputer, minicomputer, or mainframe. Those vendors excluded from the guide and our reasons are provided in Table A-1. Both the list and the table provide an address, telephone number, and point of contact for each vendor.

Microcomputer Software Vendors

Advanced Communications Systems 25054 Lorain Road North Olmsted, OH 44070 Dan Norris (800) 223-5424

American Business Computer 1968 Green Road P. O. Box 305 Ann Arbor, MI 48106 Anne Hurtubise (313) 930-7840

American Custom Software, Inc. 2420 Fisk Road Cookeville, TN 38501 Robert Sparkman (615) 537-6516

The APL Group, Inc. 644 Danbury Road Wilton, CT 06897 Rick Samuelson (205) 762-3933

Baggerly & Associates 1420 N. Claremont Boulevard, Suite 209C Claremont, CA 91711 Elizabeth Nash (714) 625-7917

Bell Atlantic Network Services, Inc. 1310 N. Courthouse Road, 7th Floor Arlington, VA 22201 Marjorie MacArthur (703) 974-3919 Birmingham Computer Group, Inc. 30850 Telegraph Road, Suite 250 Birmingham, MI 48010 Chuck Townsend (313) 540-0640

Lloyd Bush, Inc. 156 William Street New York, NY 10038 Marcy McKinley (212) 962-4004

CAN/AM Tech Inc. 205 South Main Street Slippery Rock, PA 16057 Norm Morrison Dave Scheele (412) 794-5884

Control Data Corporation 14725 Detroit Avenue Lakewood, OH 44107 Phil Kimble (919) 854-4563 Jim Townes (703) 998-1870

Data Dispatch Corporation 2000 Corporate Ridge, Suite 910 McLean, VA 22102 Fred Cuthbertson (703) 749-3636

DIGIT Software, Inc. P. O. Box 1425 Silver Spring, MD 20902 Todd Ross (301) 593-8952

DNS Associates, Inc.
One Militia Drive, Suite B1
Lexington, MA 02173
Hugh Stewart
(617) 862-8569

Dynamic Business Systems 24600 Center Ridge Road Westlake, OH 44145 Dennis Chatfield (216) 398-6088

EDI, Inc. 19630 Club House Road Gaithersburg, MD 20879 Ralph Notto (301) 670-0811

Electronic Data Systems 800 Tower Drive, 2nd Floor Troy, MI 48007-7019 Ellen Lux (800) 365-8232

Foretell Corporation 155 North Pfingsten Road, Suite 210 Deerfield, IL 60015 Michael Fitch Lynne Pilsner (708) 317-9000

General Electric Information Services 401 North Washington Street Rockville, MD 20850 Dick Donohoe James Motyka (301) 340-4000

Grace Computer Resources, Inc. 204 Merchants Drive Norcross, GA 30093 Roy Leffew, Jr. (404) 939-1743

Harbinger*EDI Services 1800 Century Place, Suite 340 Atlanta, GA 30345 Jim Langford (404) 320-1636 International Business Machines 3405 West Buffalo Avenue Mail Drop S405A Tampa, FL 33630 Mike McElroy (813) 878-4118

Integrated Telecommunication Software Corp. 7840 North Lincoln Avenue Skokie, IL 60077 Phil Keminsky (708) 677-0800

LEK Product Marketing Company, Inc. 2226 E. 117th Street Burnsville, MN 55337 Larry Kramer (612) 895-0192

MAXXUS, Inc. 140 Second Street, Suite 603 San Francisco, CA 94105 John Fountain (415) 243-9690

Perwill Incorporated 5053 La Mart Drive, Suite 101 Riverside, CA 92507 Joan Nolan (714) 683-7920

Piedmont Systems, Inc. 4400 Silas Creek Parkway, Suite 300 Winston-Salem, NC 27104 Chuck Cloer (919) 760-3620

RMS, Inc. 17187 N. Laurel Park Drive, Suite 204 Livonia, MI 48152 John Bennett (313) 462-1200 St. Paul Software 754 Transfer Road St. Paul, MN 55114 Sharon Roland (612) 641-0963

Sterling Software, ORDERNET Services Division P. O. Box 7160 4600 Lakehurst Court Dublin, OH 43017 Doug Stewart (614) 793-7000

Supply Tech, Inc. 27784 Franklin Road Southfield, MI 48034 Wendell Holladay (313) 357-3430

Synergistic Systems, Inc. 442 North 3rd Street Neptune Beach, FL 32233 Ron Meison (904) 249-0201

Minicomputer Software Vendors

ACS Network Systems 1000 Burnett Avenue Concord, CA 94520 Michael Nelson (415) 602-2000

Advantage Systems, Inc. 30680 Montpelier Drive, Suite 350 Madison Heights, MI 48071 David Williams (313) 588-3480

American Business Computer 1968 Green Road P. O. Box 305 Ann Arbor, MI 48106 Anne Hurtubise (313) 930-7840

Birmingham Computer Group, Inc. 30850 Telegraph Road, Suite 250 Birmingham, MI 48010 Chuck Townsend (313) 540-0640

Control Data Corporation 14725 Detroit Avenue Lakewood, OH 44107 Phil Kimble (919) 854-4563 Jim Townes (703) 998-1870

Digital Equipment Corporation 146 Main Street Maynard, MA 01754 Craig Mitchell (603) 884-0753 DNS Associates, Inc.
One Militia Drive, Suite B1
Lexington, MA 02173
Hugh Stewart
(617) 862-8569

EDI, Inc. 19630 Club House Road Gaithersburg, MD 20879 Ralph Notto (301) 670-0811

EDI Solutions, Inc. 7760 France Avenue South, Suite 1140 Minneapolis, MN 55435 Jeff Kessler (612) 831-9000

Electronic Data Systems 800 Tower Drive, 2nd Floor Troy, MI 48007-7019 Ellen Lux (800) 365-8232

International Business Machines 3405 West Buffalo Avenue Mail Drop S405A Tampa, FL 33630 Mike McElroy (813) 878-4118

LEK Product Marketing Company, Inc. 2226 E. 117th Street
Burnsville, MN 55337
Larry Kramer
(612) 895-0192

MPACT EDI Systems, Inc. 17197 North Laurel Park Drive Livonia, MI 48152 Skip Krassa (313) 462-2244 Perwill Incorporated 5053 La Mart Drive, Suite 101 Riverside, CA 92507 Joan Nolan (714) 683-7920

Piedmont Systems, Inc. 4400 Silas Creek Parkway, Suite 300 Winston-Salem, NC 27104 Chuck Cloer (919) 760-3620

Radley Business Computers, Inc. 23077 Greenfield Road Southfield, MI 48075 Will Soutar (800) 334-9934 (313) 559-6858

RMS, Inc. 17187 N. Laurel Park Drive, Suite 204 Livonia, MI 48152 John Bennett (313) 462-1200

St. Paul Software 754 Transfer Road St. Paul, MN 55114 Sharon Roland (612) 641-0963

Sterling Software, ORDERNET Services Division P. O. Box 7160 4600 Lakehurst Court Dublin, OH 43017 Doug Stewart (614) 793-7000

Wright Systems, Inc. 14492 Sheldon Road, Suite 300 Plymouth, MI 48170 Dick Dressell (800) 234-7253 (313) 459-7760

Mainframe Software Vendors

American Business Computer 1968 Green Road P. O. Box 305 Ann Arbor, MI 48106 Anne Hurtubise (313) 930-7840

Control Data Corporation 14725 Detroit Avenue Lakewood, OH 44107 Phil Kimble (919) 854-4563 Jim Townes (703) 998-1870

EDI Solutions, Inc. 7760 France Avenue South, Suite 1140 Minneapolis, MN 55435 Jeff Kessler (612) 831-9000

General Electric Information Services 401 North Washington Street Rockville, MD 20850 Dick Donohoe James Motyka (301) 340-4000

International Business Machines 3405 West Buffalo Avenue Mail Drop S405A Tampa, FL 33630 Mike McElroy (813) 878-4118

Perwill Incorporated 5053 La Mart Drive, Suite 101 Riverside, CA 92507 Joan Nolan (714) 683-7920 St. Paul Software 754 Transfer Road St. Paul, MN 55114 Sharon Roland (612) 641-0963

Sterling Software, ORDERNET Services Division P. O. Box 7160 4600 Lakehurst Court Dublin, OH 43017 Doug Stewart (614) 793-7000

Supply Tech, Inc. 27784 Franklin Road Southfield, MI 48034 Wendell Holladay (313) 357-3430

TSI International 45 Danbury Road P. O. Box 840 Wilton, CT 06897-0840 Meg Murdock (203) 761-8600

TABLE A-1
VENDORS NOT INCLUDED IN GUIDE

| Company | Contact | Reason |
|--|---|---|
| AT&T 55 Corporate Drive Bridgewater, NJ 08807-6991 | Laurie Mosca (201) 658-6182 | Remarkets EDI translation software products developed by ACS Network Systems, Inc.; EDI, Inc.; RMS, Inc.; Supply Tech, Inc.; and The APL Group, Inc. |
| Bakertech Systems, Inc. 7901 Flying Cloud Drive Suite 129 Eden Prairie, MN 55344 | Chuck Leininger (612) 942-0638 | Remarkets Wright System's, Inc., EDI translation software package, "Wright EDI." |
| Base 2 Corporation 707 Plaza 8, Suite 201 Sheboygan, WI 53081 | Dave Price Paul Gutelius (414) 457-6283 | Product has been developed exclusively for automotive industry suppliers. |
| Comprehensive Technologies International, Inc. 14500 Avion Parkway, Suite 250 Chantilly, VA 22021 | Dean Hawkes (703) 263-1000 | Product has been developed exclusively for health care industry. |
| Computer Power, Inc. P. O. Box 5568 Florence, SC 29502 | Jim Curley (803) 667-0601 | Requested to be excluded; product is primarily used by hospitals, industry, and electronics. |
| Dun & Bradstreet Software 3445 Peachtree Road, Northeast Atlanta, GA 30326 | Frank Buchheit (404) 239-3411 | Provides business applications that support EDI; EDI translator may only be purchased as part of application. Management Science America, Inc., merged with McCormick and Dodge to form D&B Software. |
| Fritz Companies, Inc. P. O. Box 66215 AMF O'Hare International Airport Chicago, IL 60666 | John Fitzgerald (708) 616-5600 | Product has been developed exclusively for import and export companies. |
| Future Three Software, Inc. 33031 Schoolcraft Road Livonia, MI 48150 | Sarah Eatherly (313) 261-5609 | Product has been developed exclusively for the automotive industry. |

TABLE A-1
VENDORS NOT INCLUDED IN GUIDE (Continued)

| Company | Contact | Reason |
|--|------------------------------------|---|
| Genzlinger Associates, Inc. Two Northfield Plaza, Suite 212 5700 Crooks Road Troy, MI 48098 | Karen Strichartz (313) 879-7070 | Product has been developed exclusively for automotive and related industries. |
| Innovative Computing Corporation 4411 Highline Boulevard Oklahoma City, OK 73147 | Doug Madden (405) 949-9070 | Product is industry specific; translator can only be purchased as part of a trucking and transportation software package. |
| Interchange Systems, Inc. 1620 Massachusetts Avenue Lexington, MA 02173 | John Ladner (617) 862-0010 | Product is application specific; software is used to electronically move payments between banks and their trading partners. |
| LDJ Electronics, Inc. 2200 Stephenson Highway P. O. Box 219 Troy, MI 48099 | N/A (313) 528-2202 | Product has been developed primarily for the automotive industry. |
| LEXEL Corporation 571 Union Avenue New Windsor, NY 12550 | Sheldon Langer (914) 561-4286 | Remarkets EDI translation software products developed by ACS Network Systems; Sterling Software; and Supply Tech, Inc. |
| Logistics Systems (formerly Infotronic Systems) 8300 Logistics Drive Zeeland, MI 49464 | George Smeenge (616) 772-0028 | Product is industry specific; translation software can only be purchased as part of a warehousing software package. |
| Management Computer Systems 123 North Union Avenue Cranford, NJ 07016 | David Walsh (201) 272-3080 | Product has been developed exclusively for the food industry. |
| Manufacturing Systems, Inc. P. O. Box 868 6920 Riverwood Drive Knoxville, TN 37901 | Walter Williams (615) 637-4147 | Requested to be excluded; company only works with manufacturing companies located in East Tennessee. |

TABLE A-1
VENDORS NOT INCLUDED IN GUIDE (Continued)

| Company | Contact | Reason |
|---|--|--|
| National Systems Corporation 51 Madison Avenue 22 nd Floor New York, NY 10010 | Michael Gibbons (212) 679-6060 | Product has been developed exclusively for the banking and finance industries. |
| Paper Free Systems, Inc. 733 15 th Street, Northwest Suite 700 Washington, DC 20005 | Dan Kazzazz (202) 628-6211 | Provides EDI integration services; does not offer a translation software package for purchase. |
| PLP Systems, Inc. 631 Doe Drive Murfreesboro, TN 37130 | Bill Parrott (615) 896-0081 | Remarkets EDI translation software products developed by ACS Network Systems and Supply Tech, Inc.; also develops custom EDI software. |
| Prophet 21 19 West College Avenue Yardley, PA 19067 | Debbie Dickerson (215) 493-8900 | Product is a turnkey system developed primarily for industrial distribution users. |
| RAILINC Corporation 50 F Street, Northwest Washington, DC 20001 | Joe Ready (202) 639-5580 | Remarkets Data Dispatch Corporation's translation software package, "EDI/SYNAPSE." |
| Software Associates 39 East Main Street Little Falls, NJ 07424 | Joe Wells (201) 812-0900 | Remarkets Sterling Software's EDI translation software packages; also performs EDI integration and customization services. |
| TanData Corporation 700 TanData Plaza 1400 South Boston Avenue Tulsa, OK 74119 | Daniel Biby (918) 585-1907 | Product is industry specific; translation software can only be purchased as part of a parcel manifest system. |
| Technalysis Corporation 6700 France Avenue Minneapolis, MN 55435 | Jim Clark Gail Hildrent (612) 925-5900 | Provides EDI system integration services; does not offer a translation software package for purchase. |

TABLE A-1
VENDORS NOT INCLUDED IN GUIDE (Continued)

| Company | Contact | Reason |
|---|---------------------------------|---|
| Txbase Systems, Inc. 20 Valleywood Drive, Suite 101 Markham, Ontario L3R6G1 | Ray Talwar (416) 477-1238 | Product is industry specific; translator is sold as part of a repetitive manufacturing system on Unix platforms (translator is from Electronic Data Systems). |
| Universal Software, Inc. Marshfield Professional Center 1020 Plain Street Marshfield, MA 02050 | Norman Platt (617) 837-5011 | Provides EDI communication software to EDI VANs for IBM DOS/VS(E) and MVS operating environments. |
| Vertical Systems, Inc. 2030 First Avenue, Suite 201 Seattle, WA 98101 | Bill Pickard (206) 728-7111 | Remarkets Wright System's, Inc., EDI translation software package, "Wright EDI." |
| World Trade Services P. O. Box 569 Beaverton, OR 97075 | Mark Anderson (800) 338-4333 | Product has been developed primarily for international trade management. |

APPENDIX B

VENDOR INFORMATION

This appendix provides detailed information on the products offered by each of the EDI software vendors, including hardware operating environment, product pricing, and third-party networks directly accessed by the software.

ACS Network Systems

Address: 1000 Burnett Avenue

Concord, CA 94520

Contact: Michael Nelson

Phone: (415) 602-2000

Product: EDI/36

EDI/38 EDI/4XX

Hardware/Operating System Environment: IBM System 36, System 38, AS400

EDI Standards/Transaction Sets Supported: X12, TDCC, UCS, EDIFACT

Pricing:

Basic Package Cost:

Includes one network communications module

EDI/36: \$5,700 EDI/38: \$9,000

EDI/4XX: \$7,000 - \$18,000

Additional Charge Per EDI Standard: None

Additional Charge Per Transaction Set: None

Annual Maintenance Fee: 12 percent of purchase price

Maintenance Fee Includes: Standards updates, software enhancements, tele-

phone support

Training Fee: \$595; classes are scheduled monthly on the East Coast, Midwest,

and West Coast.

Additional Fees: Additional network communications modules cost \$700 -

\$1,000 depending on the computer used.

Networks Directly Accessed: GEIS; ORDERNET; IBM; Control Data; AT&T; Western Union; Kleinschmidt; TranSettlements; CompuServe; Harbinger; Agri Data; Ford; Chrysler; GM; Walmart; Sears; BT Tymnet

Vendor Experience

Year Company Founded: 1987 (parent company formed in 1976)

Date Package First Available: 1987

EDI Professional Staff Resources

Technical Staff: 42

Hot Line: 14

Total: 68

Miscellaneous Information: Toll-free telephone support; vendor is a division of

Premenos Corporation.

Programming Language Used by Package: RPG

Advanced Communications Systems

Address: 25054 Lorain Road

North Olmsted, OH 44070

Contact: Dan Norris

Phone: (800) 223-5424

Product: ACSPCX12

Hardware/Operating System Environment: IBM compatible XT, AT, PS/2, with

10MB hard disk, 640K RAM, MS-DOS 3.0

EDI Standards/Transaction Sets Supported: TDCC, AIAG, X12, ANSI subsets

Pricing:

Basic Package Cost:

\$1,650; (Transaction sets cost an additional \$350 for each trading partner.)
\$3,000; (Includes four trading partners and all transaction sets; \$350 for each additional trading partner.)

Additional Charge Per EDI Standard: None

Additional Charge Per Transaction Set: None

Annual Maintenance Fee: \$595

Maintenance Fee Includes: Software enhancements, standards updates, telephone support

phone support

Training Fee: On-site installation included in the purchase price for a limited

area; must pay airfare for one instructor.

Additional Fees: Not available

Networks Directly Accessed: Control Data; GEIS; RAILINC; CompuServe; Ford;

GM; Walmart; Service Merchandise; IBM; CTX; BT Tymnet

Vendor Experience

Year Company Founded: 1985

Date Package First Available: 1987

EDI Professional Staff Resources

Technical Staff: 6

Hot Line: 2

Total: 15

Miscellaneous Information: Revenue is derived exclusively from EDI services.

Programming Language Used by Package: COBOL

Advantage Systems, Inc.

Address: 30680 Montpelier Drive, Suite 350

Madison Heights, MI 48071

Contact: David Williams

Phone: (313) 588-3480

Product: EDI Advantage

Hardware/Operating System Environment: IBM System 36, 38, AS400

EDI Standards/Transaction Sets Supported: X12

Pricing:

Basic Package Cost:

Includes two transaction sets and source code

System 36: \$3,000 System 38: \$6,000

Additional Charge Per EDI Standard: None

Additional Charge Per Transaction Set: System 36 - \$500; System 38 - \$700

Annual Maintenance Fee: 15 percent of installed software price

Maintenance Fee Includes: Hot line, standards updates, software enhance-

ments

Training Fee: None

Additional Fees: None

Networks Directly Accessed: Control Data, BT Tymnet

Vendor Experience

Year Company Founded: 1984

Technical Staff: 3

Hot Line: 1

Total: 5

Miscellaneous Information: Product was developed primarily for the automotive industry but is not restricted to that industry.

Programming Language Used by Package: System 36 - RPG II

System 38, AS400 - RPG III

American Business Computer

Address: 1968 Green Road

P. O. Box 305

Ann Arbor, MI 48106

Contact: Anne Hurtubise

Phone: (313) 930-7840

Product: EDE-PC (written for automotive industry)

EDI-ExCel/PC EDI-ExCel/Unix

EDI-Server (for distributed EDI systems)

Hardware/Operating System Environment:

EDE-PC: IBM compatible XT, AT, PS/2, with DOS 2.0 or higher, 10MB hard disk,

512K RAM

EDI-ExCel/PC: IBM compatible PC

EDI-ExCel/Unix: AT&T 3B family; NCR Tower (Unix or SCO Xenix); HP9000;

Gould-UX; IBM RS/6000

EDI-Server: AT&T 3B family; NCR Tower; HP9000; IBM RS/6000

EDI Standards/Transaction Sets Supported: X12, TDCC, WINS, UCS

Pricing:

Basic Package Cost:

EDE-PC: \$2,000 - \$5,000 EDI-ExCel/PC: \$3,000 - \$7,000 EDI-ExCel/Unix: \$5,000 - \$15,000 EDI-Server: \$15,000 - \$100,000

Additional Charge Per EDI Standard: None

Additional Charge Per Transaction Set: None

Annual Maintenance Fee: EDE-PC, EDI-ExCel, and EDI-Server — 20 percent

of retail software cost

Maintenance Fee Includes: Hot line, standards updates, software enhance-

ments

Training Fee: Included if at vendor's location; if at user's location, travel and living expenses.

Additional Fees: Not available

Networks Directly Accessed: GEIS; CompuServe; Control Data; IBM; Kleinschmidt;

ORDERNET; Telenet; Chrysler; Ford; GM; AT&T; BT Tymnet

Vendor Experience

Year Company Founded: 1976

Date Package First Available: EDE-PC: 1986; EDI-ExCel: 1989; EDI-Server:

1990

EDI Professional Staff Resources

Technical Staff: 10 plus 5 contractor personnel

Hot Line: 6

Total: 40

Miscellaneous Information: Vendor is owned by TSM Computing Group, a subsidiary of Thomas Monaghan, Inc.

EDE-PC is sold as a "solution" product for the automotive industry; EDI-ExCel and EDI-Server are not industry specific.

Programming Language Used by Package:

EDE-PC: Available in both BASIC and C

EDI-ExCel: C

EDI-Server: C and Informix database

American Custom Software, Inc.

Address: 2420 Fisk Road

Cookeville, TN 38501

Contact: Robert Sparkman

Phone: (615) 537-6516

Product: BPT (Business Partner Translator)

Hardware/Operating System Environment: IBM compatible PC, XT, AT, PS/2, with

10MB hard disk, 640K RAM, MS-DOS 3.0 (will operate on Novell Network)

EDI Standards/Transaction Sets Supported: X12, AIAG, VICS, UCS, TDCC, WINS,

GM, Ford

Pricing:

Basic Package Cost:

One trading partner: \$1,995

Multiple trading partners (includes setup for 1st 10 partners): \$2,995

After 10th partner: \$295 per transaction set

Additional Charge Per EDI Standard: None

Additional Charge Per Transaction Set: See above

Annual Maintenance Fee: 15 percent of software cost

Maintenance Fee Includes: EDI help desk, standards updates, software

enhancements

Training Fee: On site: \$450 per day plus expenses

Additional Fees: None

Networks Directly Accessed: GEIS; IBM; Control Data; Kleinschmidt; BT Tymnet;

RAILINC

Vendor Experience

Year Company Founded: 1984

Technical Staff: 3

Hot Line: 3

Total: 10

Miscellaneous Information: First wrote EDI translation software for the automobile

industry in 1984.

Programming Language Used by Package: BASIC, C, Assembly

The APL Group, Inc.

Address: 644 Danbury Road

Wilton, CT 06897

Contact: Rick Samuelson

Phone: (203) 762-3933

Product: QualEDI

Hardware/Operating System Environment: IBM compatible XT, AT, PS/2 with

MS-DOS 3.1 or higher

EDI Standards/Transaction Sets Supported: X12, TDCC, UCS, VICS, WINS,

EDIFACT

Pricing:

Basic Package Cost:

Single trading partner: \$1,650

Stand-alone: \$2,700 Front-end: \$3,200

(Vendor offers volume discounts)

Additional Charge Per EDI Standard: None

Additional Charge Per Transaction Set: None

Annual Maintenance Fee:

Single trading partner: \$450

Stand-alone: \$550 Front-end: \$700

Maintenance Fee Includes: Hot line, software enhancements, standards

updates, and all transaction sets currently used as well as those requested in

the future

Training Fee: On site: \$500 per day plus travel and expenses

Additional Fees: Not available

Networks Directly Accessed: BT Tymnet; ORDERNET; Kleinschmidt; Western

Union; GEIS; CNCP; CompuServe; Control Data; TranSettlements; RAILINC; Ford;

AT&T; Telecom Canada; IBM

Vendor Experience

Year Company Founded: 1983

Date Package First Available: 1984

EDI Professional Staff Resources

Technical Staff: 5

Hot Line: 4

Total: 17

Miscellaneous Information: Software assumes that only one communications network will be connected to the computer. If multiple network connections are desired, additional directories must be created on the system as a "workaround."

ANSI experience is primarily in the purchasing functions.

Baggerly & Associates

Address: 1420 N. Claremont Boulevard, Suite 209C

Claremont, CA 91711

Contact: Elizabeth Nash

Phone: (714) 625-7917

Product: *EDI*FOCUS*

Hardware/Operating System Environment: IBM compatible XT, AT, PS/2 with

20MB hard disk, 640K RAM, MS-DOS 3.0

EDI Standards/Transaction Sets Supported: X12, TDCC, VICS, WINS, UCS

Pricing:

Basic Package Cost:

\$945 — Translator and data input screens only; applications system interface and communications software are not included.

\$1,500 — Interface to applications system (flat file) and host interface (permits computer to operate as a front-end computer).

Additional Charge Per EDI Standard: None

Additional Charge Per Transaction Set: None

Annual Maintenance Fee: \$150 for *EDI*FOCUS*; \$300 for interface module

Maintenance Fee Includes: Standards updates, software enhancements, telephone support for software problem resolution

Training Fee: Varies depending on the extent of training required.

Additional Fees: Telephone support consultation; call for hourly rate.

Networks Directly Accessed: Western Union; GEIS; IBM; BT Tymnet

Vendor Experience

Year Company Founded: 1983

Technical Staff: 8

Hot Line: 3

Total: 14

Miscellaneous Information: Vendor can also provide custom application development and implementation support.

Bell Atlantic Network Services, Inc.

Address: 1310 N. Courthouse Road, 7th Floor

Arlington, VA 22201

Contact: Marjorie MacArthur

Phone: (703) 974-3919

Product: IntelliTrade

IntelliTrade Plus

Hardware/Operating System Environment: IBM compatible AT or PS/2 with MS-

DOS 2.0 or higher

EDI Standards/Transaction Sets Supported: X12

Pricing:

Basic Package Cost:

\$799 if purchased at trading partner seminar; otherwise \$999

Additional Charge Per EDI Standard: Not available

Additional Charge Per Transaction Set: Not available

Annual Maintenance Fee: \$126

Maintenance Fee Includes: Software enhancements, standards updates

Training Fee: None

Additional Fees: None

Networks Directly Accessed: Bell Atlantic (IntelliTrade EDI); hot line is included as

part of the network mailbox fee.

Vendor Experience

Year Company Founded: 1984

Date Package First Available: 4th quarter 1990

Technical Staff: 1

Hot Line: 4

Total: 5

Miscellaneous Information: Bell Atlantic has an agreement with Harbinger*EDI Services to use Harbinger's InTouch*EDI products as the basis for the IntelliTrade products. Bell Atlantic has modified Harbinger's products to access the IntelliTrade EDI network.

Birmingham Computer Group, Inc.

Address: 30850 Telegraph Road, Suite 250

Birmingham, MI 48010

Contact: Chuck Townsend

Phone: (313) 540-0640

Product: DTS: communications and translation software module with data

mapping

Hardware/Operating System Environment: HP3000 (MPE); DEC VAX (VMS); IBM compatible XT, AT, PS/2, with MS-DOS 2.1 or higher, 10MB hard disk, 512K RAM (also operates with Novell Network and other LANs)

EDI Standards/Transaction Sets Supported: X12, TDCC, EDIFACT, Kmart

Pricing:

Basic Package Cost:

Microcomputer: \$1,500 - \$8,200, includes one trading partner and DTS;

\$400 for each additional trading partner

HP3000 and VAX: \$11,000 - \$35,000, includes one trading partner and DTS;

\$1,500 for each additional trading partner

Additional Charge Per EDI Standard: Microcomputer: \$1,900; HP3000, VAX:

\$4,500

Additional Charge Per Transaction Set: None

Annual Maintenance Fee: 12 percent of purchase price

Maintenance Fee Includes: Standards updates, hot-line support, new software

releases

Training Fee: \$60 per hour at vendor location; on site, travel and living

expenses are extra.

Additional Fees: Source code available for \$15,000

Networks Directly Accessed: IBM; GEIS; Control Data; BT Tymnet

Vendor Experience

Year Company Founded: 1984

Date Package First Available: 1985

EDI Professional Staff Resources

Technical Staff: 6

Hot Line: 3

Total: 14

Miscellaneous Information: Other services available include manufacturing materials requirement planning software systems, bar coding systems, and consulting.

Programming Language Used by Package: Mostly COBOL

Lloyd Bush, Inc.

Address: 156 William Street

New York, NY 10038

Contact: Marcy McKinley

Phone: (212) 962-4004

Product: X-Change

Hardware/Operating System Environment: IBM compatible XT, AT, PS/2 with

MS-DOS 3.0, 10MB hard disk, 640K RAM

EDI Standards/Transaction Sets Supported: X12, TDCC, AIAG, TCIF, VICS

Pricing:

Basic Package Cost: \$895 (\$495 if 25 packages or more are purchased)

Additional Charge Per EDI Standard: None

Additional Charge Per Transaction Set: None

Annual Maintenance Fee: None

Maintenance Fee Includes: Software support

Training Fee: No training required

Additional Fees: Optional software upgrades available for \$75-\$100 (stan-

dards updates are included)

Networks Directly Accessed: BT Tymnet; Western Union; GEIS; Control Data;

RAILINC; ORDERNET

Vendor Experience

Year Company Founded: 1971

Technical Staff: 3 (1 is also in technical support)

Hot Line: 4

Total: 6

Miscellaneous Information: Vendor also provides financial consulting for municipal bonds, timesharing, and other products.

CAN/AM Tech Inc.

Address: 205 South Main Street

Slippery Rock, PA 16057

Contact: Norm Morrison

Dave Scheele

Phone: (412) 794-5884

Product: E-Z Order

Hardware/Operating System Environment: IBM compatible XT, AT, PS/2 with

MS-DOS 3.0, 20MB hard disk, 512K RAM

EDI Standards/Transaction Sets Supported: X12, TDCC, EDIFACT

Pricing:

Basic Package Cost: \$1,495 (includes communications)

Additional Charge Per EDI Standard: None

Additional Charge Per Transaction Set: None

Annual Maintenance Fee: \$495

Maintenance Fee Includes: Upgrades to standards, software enhancements, hot

line, reduced rate on any additional transaction sets required in the future

Training Fee: None

Additional Fees: \$500 per day for customized data entry screens, reports, and

flat file interfaces

Networks Directly Accessed: GEIS, Infonet (Additional networks can be accessed

upon request.)

Vendor Experience

Year Company Founded: 1985

Technical Staff: 2 plus contract programmers

Hot Line: Staffed by Epson Canada

Total: 4

Miscellaneous Information: Vendor has entered into a distribution and joint support agreement with Epson Canada, MetCan, and Emerging Technologies USA. Hot line support is accessed via Epson's 800 number support network.

Programming Language Used by Package: Turbo Pascal, C

Control Data Corporation

Address: 14725 Detroit Avenue

Lakewood, OH 44107

Contact: Phil Kimble

Jim Townes

Phone: (919) 854-4563

(703) 998-1870

Product: REDI-MICRO – microcomputers

REDI-EXCHANGE - mainframe MVS operating system; supports only

X12 standards

REDI-TRANSLATOR - all mainframe platforms including MVS

Hardware/Operating System Environment: IBM mainframe (MVS, DOS, DOS/VSE); DEC (Microvax, 6XXX, 8XXX, VMS); IBM compatible PC, XT, AT, 386 with hard disk, 512K RAM, MS-DOS 2.11 or higher; HP (Micro, 3000, Series I-II, 3X-7X, 9XX)

EDI Standards/Transaction Sets Supported: AIAG, X12, WINS, UCS, TDCC, VICS, EDIFACT

Pricing:

Basic Package Cost:

REDI-MICRO: \$700 includes communications software

REDI-EXCHANGE: \$7.500

REDI-TRANSLATOR: DEC: \$12,000 - \$22,500; HP: \$12,000 - \$22,500;

IBM MVS: \$22,500 - \$27,500 (Vendor offers volume discounts.)

Additional Charge Per EDI Standard: None

Additional Charge Per Transaction Set: REDI-MICRO - transaction sets are sold as a "family"; each family is \$250 at order time, and \$500 thereafter. REDI-EXCHANGE and REDI-TRANSLATOR - all transaction sets are included.

Annual Maintenance Fee: First 12 months are free for all products.

REDI-MICRO: currently free; a fee may be charged beginning the fourth

quarter of 1990.

REDI-EXCHANGE: 15 percent

REDI-TRANSLATOR: DEC and HP: \$1,600 - \$3,200

REDI-TRANSLATOR: IBM: \$3,200 - \$3,700

Maintenance Fee Includes: Standards updates, software enhancements, hot

line, 2 days of installation support for REDI-TRANSLATOR

Training Fee: \$300 per person at a selected site; if on a consulting basis,

\$1,200 per day with travel and living expenses additional

Additional Fees: Not available

Networks Directly Accessed: GEIS; Kleinschmidt; ORDERNET; Harbinger; Control

Data; Martin Marietta; TranSettlements; IBM; BT Tymnet; Western Union

Vendor Experience

Year Company Founded: 1957

Date Package First Available: 1985

EDI Professional Staff Resources

Technical Staff: Not provided

Hot Line: 20

Total: Not provided

Miscellaneous Information:

- Toll-free telephone support.
- Only the X12 standard is distributed with REDI-MICRO and REDI-EXCHANGE; other standards are not available. If TDCC transactions are required by a trading partner, the VAN must convert the transaction set from X12 to the appropriate TDCC-formatted transaction set.
- REDI-TRANSLATOR sold with all supported EDI standards.
- REDI-LINK communications software may be purchased for \$10,000. It is network independent and allows a mainframe to connect to any other VAN. (User can also write software or purchase communications software from another vendor.)
- Vendor has several other software modules available that can be used to print EDI documents or to communicate with a network. Vendor can provide details and prices.

Programming Language Used by Package:

REDI-EXCHANGE and REDI-MICRO: C

REDI-TRANSLATOR: COBOL 74

Data Dispatch Corporation

Address: 2000 Corporate Ridge, Suite 910

McLean, VA 22102

Contact: Fred Cuthbertson

Phone: (703) 749-3636

Product: EDI/SYNAPSE

Hardware/Operating System Environment: IBM compatible XT, AT, PS/2 with

MS-DOS 3.0, 10MB hard disk, 640K RAM

EDI Standards/Transaction Sets Supported: X12, TDCC, EDIFACT

Pricing:

Basic Package Cost: Determined by distributor

Additional Charge Per EDI Standard: None

Additional Charge Per Transaction Set: None

Annual Maintenance Fee: Determined by distributor

Maintenance Fee Includes: Updates to standards, software enhancements,

telephone support

Training Fee: Determined by distributor

Additional Fees: None

Networks Directly Accessed: RAILINC (uses a proprietary interchange envelope

header); GEIS; IBM; ORDERNET

Vendor Experience

Year Company Founded: 1983

Technical Staff: 10

Hot Line: 2

Total: 20

Miscellaneous Information: Sold exclusively through distributors, including

RAILINC Corporation.

Digital Equipment Corporation

Address: 146 Main Street

Maynard, MA 01754

Contact: Craig Mitchell

Phone: (603) 884-0753

Product: DEC/EDI

Hardware/Operating System Environment: DEC VAX (VMS)

EDI Standards/Transaction Sets Supported: X12, TDCC, EDIFACT, VICS, WINS

Pricing:

Basic Package Cost: \$11,356 - \$41,642, depending on processor size

Additional Charge Per EDI Standard: None

Additional Charge Per Transaction Set: None

Annual Maintenance Fee: Fee varies based on service and warranty contract;

average is 15 percent of software purchase price.

Maintenance Fee Includes: Depends on service and warranty contract

purchased.

Training Fee: Varies

Additional Fees: None

Networks Directly Accessed: GEIS; BT Tymnet; AT&T; Harbinger

Vendor Experience

Year Company Founded: 1957

Date Package First Available: 1990

EDI Professional Staff Resources

Technical Staff: Not available

Hot Line: Not available

Total: Not available

Miscellaneous Information: Vendor provides some consulting services.

DIGIT Software, Inc.

Address: P.O. Box 1425

Silver Spring, MD 20902

Contact: Todd Ross

Phone: (301) 593-8952

Product: MacEDI

Hardware/Operating System Environment: Apple MacIntosh

EDI Standards/Transaction Sets Supported: X12, TDCC, WINS, VICS, UCS

Pricing:

Basic Package Cost: \$1,950 for transaction manager; data mapper available for

additional fee

Additional Charge Per EDI Standard: None

Additional Charge Per Transaction Set: \$150 per data map; no charge if the

data mapper is purchased.

Annual Maintenance Fee: \$400

Maintenance Fee Includes: Software enhancements, hot line, standards

updates, data map updates

Training Fee: Not available

Additional Fees: Communications software may be purchased.

Networks Directly Accessed: ORDERNET; IBM; GEIS; Control Data; RAILINC

Vendor Experience

Year Company Founded: 1988

Technical Staff: 3

Hot Line: 3

Total: 3

Miscellaneous Information:

DNS Associates, Inc.

Address: One Militia Drive, Suite B1

Lexington, MA 02173

Contact: Hugh Stewart

Phone: (617) 862-8569

Product: EDI/Entry – a system without an application interface

EDI/Edge

Hardware/Operating System Environment: Any MS-DOS computer with 20MB hard disk, 640K RAM, MS-DOS 2.0; 386 computers with Xenix or Unix; DEC VAX (VMS or Ultrix); Apollo; Gould. (Company will port translator to any Unix platform.)

EDI Standards/Transaction Sets Supported: X12, TDCC, WINS, UCS, EDIFACT

Pricing:

Basic Package Cost: EDI/Entry: \$1,500 EDI/Edge: \$2,500

Additional Charge Per EDI Standard: None

Additional Charge Per Transaction Set: None

Annual Maintenance Fee: \$500

Maintenance Fee Includes: Toll-free hot line, standards updates, software

enhancements

Training Fee: \$500 for 2-day class

Additional Fees: Not available

Networks Directly Accessed: BT Tymnet; GEIS; CompuServe; Kleinschmidt;

Control Data; IBM; Western Union; AT&T; ORDERNET

Vendor Experience

Year Company Founded: 1979

Technical Staff: 11

Hot Line: 3

Total: 14

Miscellaneous Information: Vendor can provide consulting and implementation

services.

Dynamic Business Systems

Address: 24600 Center Ridge Road

Westlake, OH 44145

Contact: Dennis Chatfield

Phone: (216) 398-6088

Product: Trans-Sync

Hardware/Operating System Environment: IBM compatible PC, XT, AT, 386 with

MS-DOS 3.2.; 386 is recommended. (Also supports Novell network.)

EDI Standards/Transaction Sets Supported: X12, TDCC

Pricing:

Basic Package Cost: \$5,000 (includes modem)

Additional Charge Per EDI Standard: None; maintained by user

Additional Charge Per Transaction Set: None; maintained by user

Annual Maintenance Fee: \$600

Maintenance Fee Includes: Software enhancements, hot line

Training Fee: \$75 per hour

Additional Fees: \$75 per hour

Networks Directly Accessed: GEIS; Sears; BT Tymnet; RAILINC

Vendor Experience

Year Company Founded: 1985

Date Package First Available: 1986

EDI Professional Staff Resources

Technical Staff: 3

Hot Line: 2

Total: 5

Miscellaneous Information:

EDI, Inc.

Address: 19630 Club House Road

Gaithersburg, MD 20879

Contact: Ralph Notto

Phone: (301) 670-0811

Product: TELINK

Hardware/Operating System Environment: IBM compatible XT, AT, PS/2, with minimum 20MB hard disk, 640K RAM, MS-DOS 3.1; Tandem; Unisys 6000 Series

EDI Standards/Transaction Sets Supported: X12, TDCC, UCS, WINS

Pricing:

Basic Package Cost:Microcomputer: \$2,600

Tandem: \$37,000, includes 12 transaction sets and 1-year maintenance Unisys: \$11,500, includes 10 transaction sets and 1-year maintenance

Additional Charge Per EDI Standard: None

Additional Charge Per Transaction Set: Microcomputer: \$300 (quantity discounts available); Tandem: \$500; Unisys: \$500

Annual Maintenance Fee: Microcomputer: \$750; Tandem and Unisys: 15 percent of software cost

Maintenance Fee Includes: Standards updates, hot line

Training Fee: Purchase price includes 1½ days at vendor location for PC-based package; 2 days for Tandem- or Unisys-based packages.

Additional Fees: Many optional software modules are available; call vendor for prices.

Networks Directly Accessed: GEIS; ORDERNET; Kleinschmidt; BT Tymnet; RAILINC; Control Data; Telecom Canada; TranSettlements; Western Union; IBM; CompuServe; Sears; AT&T

Vendor Experience

Year Company Founded: 1982

Date Package First Available: 1984

EDI Professional Staff Resources

Technical Staff: 14

Hot Line: 3

Total: 35

Miscellaneous Information: Vendor also markets an EFT product, "MONEYLINK", and provides consulting services.

Programming Language Used by Package:

Microcomputer: FORTRAN 77 Tandem: FORTRAN 77 and C Unisys: FORTRAN 77 and C

EDI Solutions, Inc.

Address: 7760 France Avenue South, Suite 1140

Minneapolis, MN 55435

Contact: Jeff Kessler

Phone: (612) 831-9000

Product: EDItran - Translation management system

EDImap — User-definable application interface system

Hardware/Operating System Environment: IBM MVS (DOS/VSE); DEC VAX

(VMS); HP (MPE/V, MPE/XL); Stratus (VOS)

EDI Standards/Transaction Sets Supported: X12, TDCC, EDIFACT

Pricing:

Basic Package Cost:

Price is based on hardware configuration and includes source code.

EDItran: \$12,000 - \$22,500 EDImap: \$2,000 - \$5,000

Additional Charge Per EDI Standard: None

Additional Charge Per Transaction Set: None

Annual Maintenance Fee: First year is free. EDItran: \$1,600 - \$3,700;

EDImap: \$300 - \$675

Maintenance Fee Includes: Hot line, software enhancements, standards

updates

Training Fee: 2 days of on-site installation are included in basic package cost.

Additional Fees: Quoted by project; \$95/hour base fee

Networks Directly Accessed: Software is network independent.

Vendor Experience

Year Company Founded: 1986

Technical Staff: 10

Hot Line: 4

Total: 16

Miscellaneous Information:

Programming Language Used by Package: $COBOL\ 74\ and\ COBOL\ 85$

Electronic Data Systems

Address: 800 Tower Drive, 2nd Floor

Troy, MI 48007-7019

Contact: Ellen Lux

Phone: (800) 365-8232

Product: EDI*ASSET (DOS)

EDI*EXPERT (Unix)

Hardware/Operating System Environment: IBM compatible PC, XT, AT, 386 with MS-DOS 3.1 or higher; Sun 3; Sun (SPARC); AT&T 3B2; Motorola Delta 5000; NCR Tower (Unix)

EDI Standards/Transaction Sets Supported: X12, TDCC

Pricing:

Basic Package Cost:

EDI*ASSET: \$2,500 plus \$600 for each group of transaction sets EDI*EXPERT: \$10,000 plus \$2,000 for each group of transaction sets

Additional Charge Per EDI Standard: None

Additional Charge Per Transaction Set: None

Annual Maintenance Fee: EDI*ASSET: \$400; EDI*EXPERT: \$1,000

Maintenance Fee Includes: Toll-free hot line, standards updates, software enhancements

Training Fee: Depends upon knowledge of user.

Additional Fees: None

Networks Directly Accessed: All major third-party networks; EDI*EXPERT communications module costs \$1,000 for each network to be accessed.

Vendor Experience

Year Company Founded: 1962

Date Package First Available: 1987 - DOS

1990 - Unix

Technical Staff: Not available

Hot Line: 20

Total: Not available

 $\textbf{Miscellaneous Information:} \ \ Vendor\ is\ a\ wholly-owned\ subsidiary\ of\ GM.$

Programming Language Used by Package:

EDI*Asset: C EDI*Expert: C

Foretell Corporation

Address: 155 North Pfingsten Road, Suite 210

Deerfield, IL 60015

Contact: Michael Fitch

Lynne Pilsner

Phone: (708) 317-9000

Product: ESP II

Hardware/Operating System Environment: IBM compatible 286 or 386 with MS-

DOS 3.3 or higher

EDI Standards/Transaction Sets Supported: X12, EDIFACT, VICS

Pricing:

Basic Package Cost: \$2,300, includes a report writer; and purchase order,

invoice, and functional acknowledgment transaction sets

Additional Charge Per EDI Standard: None

Additional Charge Per Transaction Set: \$75, or \$300 for all remaining X12

transaction sets

Annual Maintenance Fee: \$650

Maintenance Fee Includes: Standards updates, software enhancements, hot

line

Training Fee: \$650 per person for 2 days at vendor's site

Additional Fees: None

Networks Directly Accessed: BT Tymnet; Control Data; GEIS; Sears; ORDERNET;

IBM

Vendor Experience

Year Company Founded: 1985

Date Package First Available: 1985

EDI Professional Staff Resources

Technical Staff: 6

Hot Line: 6

Total: 20

Miscellaneous Information: Peripheral equipment, bisync modems, and Windows

286 can be purchased.

Programming Language Used by Package: MicroSoft C

General Electric Information Services

Address: 401 North Washington Street

Rockville, MD 20850

Contact: Dick Donohoe

James Motyka

Phone: (301) 340-4000

Product: EDI*PC (accesses GE's network and other VANs)

EDI*T (communications software must be purchased to connect to the

desired VAN)

EDI*Central (communications software must be purchased to connect to

the desired VAN)

Hardware/Operating System Environment: EDI*PC - IBM compatible XT, AT, PS/2 with MS-DOS 2.0, 512K RAM, 7MB free on hard disk

EDI*T, EDI*Central — IBM mainframe with MVS or DOS/VSE; DEC VAX; Prime mainframe; Honeywell DPS-6; Honeywell DPS-8; Honeywell DPS-9; HP3000

EDI Standards/Transaction Sets Supported: X12, TDCC, UCS, WINS, EDIFACT

Pricing:

Basic Package Cost:

EDI*PC: \$1,495 EDI*T: \$9,500

EDI*Central: \$9,500 for Federal Government; \$20,000 for commercial

purchasers

(Source code is included.)

Additional Charge Per EDI Standard: None

Additional Charge Per Transaction Set: None

Annual Maintenance Fee: First 12 months are free; thereafter, EDI*PC: \$180;

EDI*T: \$1,200; EDI*Central: \$2,400

Maintenance Fee Includes: Hot line, standards updates, software enhance-

ments; future enhancements may not be included.

Training Fee: \$750 per person at vendor location; on-site training is negotiable.

Additional Fees: Installation Assistance: EDI*PC on site: \$500 for 1 day;

EDI*T: \$1,800 for 2 days; EDI*Central: \$1,200 per day

Networks Directly Accessed: EDI*PC includes the communications software needed to access GEIS and other major networks; EDI*T and EDI*Central can access other major networks in addition to GEIS with optional communications software.

Vendor Experience

Year Company Founded: 1879

Date Package First Available:

EDI*PC - 1986 EDI*T - 1987 EDI*Central - 1988

EDI Professional Staff Resources

Technical Staff: 50

Hot Line: 9

Total: 125

Miscellaneous Information: Toll-free hot line. User may purchase network interface software, DSXMIT, which accesses EDI VANs and Defense Data Network.

Programming Language Used by Package:

EDI*PC: C, Pascal EDI*T: COBOL

EDI*Central: COBOL

Grace Computer Resources, Inc.

Address: 204 Merchants Drive

Norcross, GA 30093

Contact: Roy Leffew, Jr.

Phone: (404) 939-1743

Product: EDI-Ware

Hardware/Operating System Environment: IBM compatible PC with MS-DOS or PC-DOS version 3.1 or higher, 640K RAM, 5MB free space on hard drive. (Network compatible with IBM and Novell.)

EDI Standards/Transaction Sets Supported: X12, TDCC, WINS, VICS, UCS, including draft standards

Pricing:

Basic Package Cost:

EDI-Ware EMS - \$300, includes free transaction set map; additional "new" transaction sets are \$100

EDI-Ware Map - \$1,000, allows user to map to user-defined database internal to EDI-Ware

Additional Charge Per EDI Standard: None

Additional Charge Per Transaction Set: \$100 for each new transaction set for EMS.

Annual Maintenance Fee: EMS - \$100; Map - \$500

Maintenance Fee Includes: Software updates, standards updates, hot line

Training Fee: \$115 per hour on-site; \$300 per day at company location

Additional Fees: Offers IBM network mailbox; call company for details.

Networks Directly Accessed: IBM, Control Data

Vendor Experience

Year Company Founded: 1981

Date Package First Available: 1986

EDI Professional Staff Resources

Technical Staff: 5

Hot Line: 2

Total: 5

Miscellaneous Information: Vendor offers additional consulting services.

Programming Language Used by Package: Visual COBOL

Harbinger*EDI Services

Address: 1800 Century Place, Suite 340

Atlanta, GA 30345

Contact: Jim Langford

Phone: (404) 320-1636

Product: InTouch*EDI – data input screens only; no application interface

InTouch*EDI PLUS - includes application interface

Hardware/Operating System Environment: IBM compatible PC, XT, AT, PS/2 with

10MB, 640K RAM, MS-DOS 3.0 or higher

EDI Standards/Transaction Sets Supported: X12, TDCC, WINS, UCS

Pricing:

Basic Package Cost:

Microcomputer programs, all transaction sets, network setup: \$900

"Bridge," including scheduler and flat-file capability: \$1,000

Additional Charge Per EDI Standard: Call vendor

Additional Charge Per Transaction Set: Call vendor

Annual Maintenance Fee: InTouch*EDI: First 12 months are free, then \$120/year or \$12/month. InTouch*EDI PLUS: First 6 months are free, then

\$300/year or \$30/month.

Maintenance Fee Includes: Standards updates, software enhancements, toll-

free hot line

Training Fee: Not available

Additional Fees: Not available

Networks Directly Accessed: Uses only Harbinger network; interconnects are

available to other major networks.

Vendor Experience

Year Company Founded: 1983

Date Package First Available: 1988

EDI Professional Staff Resources

Technical Staff: 25

Hot Line: 6

Total: 65 (including network services personnel)

Miscellaneous Information: Vendor is partly owned by Westinghouse Electric

Corporation; vendor will provide customized EDI services upon request.

Programming Language Used by Package: C, Btrieve

Integrated Telecommunication Software Corp.

Address: 7840 North Lincoln Avenue

Skokie, IL 60077

Contact: Phil Keminsky

Phone: (708) 677-0800

Product: SDIS - Standards Driven Interface System

Hardware/Operating System Environment: IBM compatible XT, AT, or 386 with

MS-DOS, Unix, or Xenix

EDI Standards/Transaction Sets Supported: X12, TDCC, VICS, UCS, EDIFACT

Pricing:

Basic Package Cost: \$500

Additional Charge Per EDI Standard: None

Additional Charge Per Transaction Set: None

Annual Maintenance Fee: \$600

Maintenance Fee Includes: Software enhancements, standards updates, new

trading partners

Training Fee: None

Additional Fees: None

Networks Directly Accessed: IBM; BT Tymnet; ORDERNET; Control Data; GEIS

Vendor Experience

Year Company Founded: 1982

Date Package First Available: 1989

EDI Professional Staff Resources

Technical Staff: 5

Hot Line: (Technical staff also supports hot line.)

Total: 8

Miscellaneous Information:

Programming Language Used by Package: COBOL Reilia and MicroFocus COBOL

International Business Machines

Address: 3405 West Buffalo Avenue

Mail Drop S405A Tampa, FL 33630

Contact: Mike McElroy

Phone: (813) 878-4118

Product: Data Interchange/MVS

Data Interchange/2 Data Interchange/36 Data Interchange/38 Data Interchange/400

Hardware/Operating System Environment: IBM mainframe 9370-3090 (MVS/TSO);

IBM PC with OS/2; IBM System 36, 38, AS400

EDI Standards/Transaction Sets Supported: X12, EDIFACT, TDCC, UCS, AIAG

Pricing:

Basic Package Cost:

Data Interchange/MVS \$18,000 - \$38,000

Data Interchange/2 \$4,000 Data Interchange/36 \$6,600 Data Interchange/38 \$11,250

Data Interchange/400 \$6,600 - \$18,150

Additional Charge Per EDI Standard: None

Additional Charge Per Transaction Set: None

Annual Maintenance Fee:

Data Interchange/MVS \$761 - \$1,224 Data Interchange/2 Not available

Data Interchange/36 \$900
Data Interchange/38 \$1,550

Data Interchange/400 \$900 - \$2,475

Maintenance Fee Includes: Not available

Training Fee:

Included in purchase price for Data Interchange/2, /36, and /38.

Data Interchange/MVS: \$1,010 Data Interchange/400: \$945

Additional Fees: Installation may be extra.

Networks Directly Accessed: IBM only

Vendor Experience

Year Company Founded: 1912

Date Package First Available: 1989

EDI Professional Staff Resources

Technical Staff: 100

Hot Line: Not available

Total: Not available

Miscellaneous Information: IBM PC QuickEDI and PC QuickEDI PLUS are DOS-based PC packages for use in a stand-alone mode; they include a customized application system. These packages require a "sponsoring" trading partner and a minimum purchase of 50 packages. Vendor provided toll-free telephone support.

Programming Language Used by Package: Not available

LEK Product Marketing Company, Inc.

Address: 2226 E. 117th Street

Burnsville, MN 55337

Contact: Larry Kramer

Phone: (612) 895-0192

Product: EDIpl Translation Software

Hardware/Operating System Environment: IBM compatible PC, XT, AT, 386 with PC/MS-DOS; IBM compatible AT, 386 with Unix and Unix-equivalent operating systems; IBM AIX

EDI Standards/Transaction Sets Supported: X12, TDCC, UCS, WINS

Pricing:

Basic Package Cost:

DOS: \$1,000 with minimum purchase of 5

System Integrator's license: \$22,000 plus \$250 per installation

Unix site license: \$7,500 for first port

Concurrent, Apollo, and IBM RT6000: \$15,000

Additional Charge Per EDI Standard: System Integrators: \$5,000 per standards

release

Additional Charge Per Transaction Set: None

Annual Maintenance Fee: 12 percent of license and standards fee; free the first

6 months

Maintenance Fee Includes: Hot line, standards updates, software enhance-

ments

Training Fee: Call vendor.

Additional Fees: Vendor will customize mapping of EDI data to application

database formats; typically at a cost of \$500 per transaction set.

Networks Directly Accessed: Network interface software is not provided but vendor will write a script to use the VAN's communications software.

Vendor Experience

Year Company Founded: 1985

Date Package First Available: 1988

EDI Professional Staff Resources

Technical Staff: Not available

Hot Line: Not available

Total: Not available

Miscellaneous Information: Vendor provides custom programming services.

Programming Language Used by Package: C

MAXXUS, Inc.

Address: 140 Second Street, Suite 603

San Francisco, CA 94105

Contact: John Fountain

Phone: (415) 243-9690

Product: MAXX*EDI-ENTRY - send/receive capability only; no application

interface

MAXX*TRANSLATOR - requires user operation MAXX*EDI - has a manager and auto scheduler

Hardware/Operating System Environment: IBM compatible AT, 386, 486, with

MS-DOS 3.0 or higher; networking capability

EDI Standards/Transaction Sets Supported: X12, TDCC, EDIFACT, WINS, VICS

Pricing:

Basic Package Cost:

MAXX*EDI-ENTRY: \$1,500 - \$2,500 MAXX*TRANSLATOR: \$3,500 - \$23,500

MAXX*EDI: \$3,500 - \$23,500

Additional Charge Per EDI Standard: None

Additional Charge Per Transaction Set: None

Annual Maintenance Fee: 15 percent of software purchase price

Maintenance Fee Includes: Hot line, software enhancements, standards

updates

Training Fee: \$1,500 - \$2,500, depending on package

Additional Fees: None

Networks Directly Accessed: BT Tymnet; IBM; AT&T; GEIS; Harbinger. (Vendor

will interface to any network requested by user at no charge.)

Vendor Experience

Year Company Founded: 1986

Date Package First Available: 1988

EDI Professional Staff Resources

Technical Staff: Not available

Hot Line: Not available

Total: Not available

Miscellaneous Information: Vendor also sells EFT products including MAXX-ACH;

all MAXX-products are modular and build upon one another.

Programming Language Used by Package: C

MPACT EDI Systems, Inc.

Address: 17197 North Laurel Park Drive

Livonia, MI 48152

Contact: Skip Krassa

Phone: (313) 462-2244

Product: Messageway (includes XWAY translator)

Hardware/Operating System Environment: Tandem

EDI Standards/Transaction Sets Supported: X12, TDCC, EDIFACT

Pricing:

Basic Package Cost:

System 6 (supports 6 concurrent communications sessions) - \$90,000 System 12 - \$180,000 (supports 12 concurrent communications sessons)

Additional Charge Per EDI Standard: None

Additional Charge Per Transaction Set: None

Annual Maintenance Fee: 18 percent of list price for site license fee; free for

first 90 days

Maintenance Fee Includes: Standards updates, toll-free telephone hot line,

software enhancements

Training Fee: \$300 per day at MPACT facilities; \$600 per day, plus expenses, at

customer facilities

Additional Fees: Many options are available; call vendor for prices.

Networks Directly Accessed: GEIS; RAILINC; Kleinschmidt; ORDERNET;

TradeNet (each is available for \$3,500)

Vendor Experience

Year Company Founded: Initially founded as Merit Systems, Inc., in 1977.

Date Package First Available: 1987

EDI Professional Staff Resources

Technical Staff: 45

Hot Line: 20

Total: 80

Miscellaneous Information: Vendor also provides EDI consulting and programming services.

Programming Language Used by Package: C, TAL, Pathway, COBOL 85

Perwill Incorporated

Address: 5053 La Mart Drive, Suite 101

Riverside, CA 92507

Contact: Joan Nolan

Phone: (714) 683-7920

Product: EDI Starterpac (Does not have an application interface; can only

send/receive invoices, purchase orders, delivery notices, and shipment

notices.)

Microcomputer: ISM-EDI - A full system that can interface other

packages, applications systems, and the HP3000.

Trade*PAC - Interface capabilities are not as sophisti-

cated.

Minicomputer: EDI/3000

EDI/Unix

Mainframe: EDI/MVS (will be released in the United States in late

1990).

Hardware/Operating System Environment: IBM compatible PC with MS-DOS or OS/2; HP3000, HP9000; NCR Tower; DEC VAX; IBM MVS mainframes (VSE).

EDI Standards/Transaction Sets Supported: X12, TDCC, WINS, EDIFACT

Pricing:

Basic Package Cost:

EDI Starterpac: \$1,500

ISM-EDI and Trade*PAC: \$5,400

EDI/3000: \$7,000 - \$27,000 EDI/Unix: Up to \$27,000

EDI/MVS: \$70,000

Additional Charge Per EDI Standard: None

Additional Charge Per Transaction Set: Call vendor.

Annual Maintenance Fee: Microcomputer: 18 percent of purchase price;

Minicomputer and mainframe: 15 percent of purchase price.

Maintenance Fee Includes: Hot line, software enhancements, standards update

Training Fee: Available upon request

Additional Fees: None

Networks Directly Accessed: GEIS, ORDERNET, IBM

Vendor Experience

Year Company Founded: 1973

Date Package First Available: 1985

EDI Professional Staff Resources

Technical Staff: 5

Hot Line: 2

Total: 10

Miscellaneous Information: Vendor will provide a 100 percent trade-in credit to customers that upgrade to a larger hardware platform.

Programming Language Used by Package: COBOL

Piedmont Systems, Inc.

Address: 4400 Silas Creek Parkway, Suite 300

Winston-Salem, NC 27104

Contact: Chuck Cloer

Phone: (919) 760-3620

Product: TEL-EDI

EDI Engine – designed to be linked to application systems, but does not

have an application interface

Hardware/Operating System Environment: TEL-EDI - DOS; SCO Unix System V;

SCO Xenix; DEC VMS (Microvax and 8000 Series)

EDI Engine – DOS, Apple MacIntosh

EDI Standards/Transaction Sets Supported: X12, TDCC

Pricing:

Basic Package Cost: TEL-EDI: \$2,495

EDI Engine: Call vendor

Additional Charge Per EDI Standard: None

Additional Charge Per Transaction Set: None

Annual Maintenance Fee: TEL-EDI base: \$374.25

TEL-EDI data mapping utility: \$200

EDI Engine: Not available

Maintenance Fee Includes: Not available

Training Fee: TEL-EDI: \$600 per day plus expenses

Additional Fees: Data mapping utility is available for \$1,190.

Networks Directly Accessed: GEIS; BT Tymnet; Western Union; Kleinschmidt; IBM;

Sears; ORDERNET; Control Data

Vendor Experience

Year Company Founded: 1987

Date Package First Available: TEL-EDI — 1987; EDI Engine — 1990

EDI Professional Staff Resources

Technical Staff: 2

Hot Line: 2

Total: 5

Miscellaneous Information:

Programming Language Used by Package:

TEL-EDI - BASIC and C

EDI Engine - C

Radley Business Computers, Inc.

Address: 23077 Greenfield Road

Southfield, MI 48075

Contact: Will Soutar

Phone: (800) 334-9934

(313) 559-6858

Product: R-EDI

Hardware/Operating System Environment: DEC VAX (VMS)

EDI Standards/Transaction Sets Supported: X12, TDCC, VICS, WINS, UCS,

EDIFACT

Pricing:

Basic Package Cost: \$6,000 and up based on CPU

Additional Charge Per EDI Standard: None

Additional Charge Per Transaction Set: None

Annual Maintenance Fee: 10 percent of list price (no hot line); 14 percent of list

price (includes hot line)

Maintenance Fee Includes: Hot line, software enhancements, standards

updates

Training Fee: \$800 plus expenses

Additional Fees: \$1,200 to set up a trading partner and their transaction sets.

Networks Directly Accessed: GEIS; IBM; Sears; Control Data; ORDERNET

Vendor Experience

Year Company Founded: 1980

Date Package First Available: 1990

EDI Professional Staff Resources

Technical Staff: 8

Hot Line: 4

Total: 12

Miscellaneous Information:

Programming Language Used by Package: DIBOL

RMS, Inc.

Address: 17187 N. Laurel Park Drive, Suite 204

Livonia, MI 48152

Contact: John Bennett

Phone: (313) 462-1200

Product: RMS VLT

Hardware/Operating System Environment: IBM compatible PC, XT, AT, PS/2, 386 with SCO Xenix System V or MS-DOS 3.3 or earlier; Unisys B25 (BTOS/CTOS); DEC VAX (VMS); Tandem (through an alliance with MPACT EDI Systems, Inc.)

EDI Standards/Transaction Sets Supported: X12, TDCC

Pricing:

Basic Package Cost: \$1,950 — includes one communications link, one trading partner profile or subset, and one EDI standard

Additional Charge Per EDI Standard: \$500 each

Additional Charge Per Transaction Set: \$250 for outgoing transaction sets

Annual Maintenance Fee: First 90 days are free; \$700

Maintenance Fee Includes: Hot line, standards updates, software enhancements

Training Fee: Vendor location — \$250 for two people; on site — \$700 plus travel and living expenses; self-taught course is available at no expense.

Additional Fees: Not available

Networks Directly Accessed: GEIS; BT Tymnet; IBM; ORDERNET; Tran-Settlements; Control Data; RAILINC; Western Union; AT&T; CompuServe; CTX; Sears

Vendor Experience

Year Company Founded: 1982

Date Package First Available: 1986

EDI Professional Staff Resources

Technical Staff: 4

Hot Line: 6

Total: 22

Miscellaneous Information: Vendor also offers consulting services and an EDI data mapper (RMS Customizer — \$1,650).

Programming Language Used by Package: MicroFocus COBOL

St. Paul Software

Address: 754 Transfer Road

St. Paul, MN 55114

Contact: Sharon L. Roland

Phone: (612) 641-0963

Product: Interconn - microcomputers

Datatran — minicomputers and mainframes

Hardware/Operating System Environment: Interconn — IBM compatible XT, AT, PS/2 with 10MB hard disk, 640K RAM

Datatran - NCR Tower (Unix); NCR I-Series mainframe (ITX); IBM 4341, 4381 (DOS/VSE); plus many other hardware platforms

EDI Standards/Transaction Sets Supported: X12; TDCC (204, 206, 210, 213, 214); AIAG; UCS; VICS; WINS

Pricing:

Basic Package Cost:

Interconn: \$1,995 (includes all transaction sets and the network interface for

first trading partner)

Datatran: Unix PC: \$3,500; NCR Tower, IBM RT, RISC machines, and AT&T 3B2: \$5,500; Sequent, Gould 9050, DEC VAX, Pyramid: \$8,500; Gould 9000: \$10,000

Additional Charge Per EDI Standard: Nominal shipping and handling

Additional Charge Per Transaction Set:

Interconn: \$250

Datatran: None - all transaction sets are included.

Annual Maintenance Fee:

Interconn: \$399

Datatran: Typically 10 percent of purchase price; varies according to platform.

First 90 days are free for all packages.

Maintenance Fee Includes: Standards updates, software enhancements, telephone support

Training Fee: \$750 per day plus travel and living expenses

Additional Fees: Not available

Networks Directly Accessed: Control Data; BT Tymnet; GEIS; IBM; CompuServe;

ORDERNET; Western Union; RAILINC; Sears

Vendor Experience

Year Company Founded: 1981

Date Package First Available: 1985

EDI Professional Staff Resources

Technical Staff: 6

Hot Line: 2

Total: 10

Miscellaneous Information:

Programming Language Used by Package:

Interconn - MicroSoft QuickBASIC

Datatran - COBOL, C

Sterling Software, ORDERNET Services Division

Address: P.O. Box 7160

4600 Lakehurst Court Dublin, OH 43017

Contact: Doug Stewart

Phone: (614) 793-7000

Product: GENTRAN®; GENTRAN Plus®; GENTRAN® 400; TRANS-

LATOR*MVS: TRANSLATOR*VSE: TRANSLATOR*36: TRANS-

LATOR*38; TRANSLATOR*4XX; MICRO*TRAN.

(Vendor also remarkets EDI, Inc.'s TELINK microcomputer product.)

Hardware/Operating System Environment: IBM MVS mainframes; DEC VAX (VMS); IBM 30XX, 43XX, 9370 (MVS or DOS/VSE); IBM System 36, System 38, AS400; Data General; IBM compatible PC, XT, AT, PS/2 with 10MB hard disk, 256 RAM, MS-DOS 2.0 or higher (although 3.1 or higher is recommended)

EDI Standards/Transaction Sets Supported: X12, TDCC, AIAG, VICS, WINS, EDIFACT, UCS

Pricing:

Basic Package Cost:

GENTRAN: IBM MVS \$36,850; VSE \$33,500; DEC VAX \$20,100

GENTRAN Plus: DOS Bi-Sync \$69,500; DOS SNA \$75,000; DOS Combo \$85,000; OS Bi-Sync \$81,500; OS SNA Peer-to-Peer \$109,500; OS Combo Peer-

to-Peer \$122,500

GENTRAN/400: Models B10, B20, B30, B35 \$9,800; B40, B45, B50 \$13,600;

B60, B70, B80 \$18,200

TRANSLATOR*MVS: \$36,850 TRANSLATOR*VSE: \$33,500 TRANSLATOR*36: \$6,000 TRANSLATOR*38: \$13,000

TRANSLATOR*400: models B10, B20, B30, B35 \$9,800; B40, B45, B50

\$13,600; B60, B70, B80 \$18,200

MICRO*TRAN: \$1,995 QUICK*TRAN: \$2,750 PRO*TRAN: \$4,250

(All basic packages include source code.)

Additional Charge Per EDI Standard: None

Additional Charge Per Transaction Set: None

Annual Maintenance Fee: First year free, then 15 percent of current price

Maintenance Fee Includes: Standards updates, hot line, software enhance-

ments

Training Fee: Two days of installation and training at user site are included in

mainframe products.

Additional Fees: Not available

Networks Directly Accessed: ORDERNET; GEIS; BT Tymnet; IBM; Control Data;

TranSettlements; Kleinschmidt; RAILINC

Vendor Experience

Year Company Founded: 1978

Date Package First Available: 1987

EDI Professional Staff Resources

Technical Staff: 35

Hot Line: 10

.......

Total: 300

Miscellaneous Information: Vendor recently purchased Metro-Mark Integrated Systems, Inc., and their line of EDI software products. Vendor also offers EDI implementation programs, database services, communications software, consulting, and EDI education.

Programming Language Used by Package:

MICRO*TRAN - 74 COBOL
TRANSLATOR*36, *38, *4XX - RPG
TRANSLATOR*VSE, TRANSLATOR*MVS - ANSI 74 COBOL
GENTRAN Products - ANSI COBOL, RPG

Supply Tech, Inc.

Address: 27784 Franklin Road

Southfield, MI 48034

Contact: Wendell Holladay

Phone: (313) 357-3430

Product: STX12

Hardware/Operating System Environment: IBM compatible XT, AT, PS/2, 386 with 640K RAM, 10MB hard disk (recommends 20MB), MS-DOS 3.0 or higher; IBM compatible mainframe (MVS and DOS/VSE)

EDI Standards/Transaction Sets Supported: X12, TDCC, UCS, EDIFACT

Pricing:

Basic Package Cost:

Microcomputer: \$2,295 - \$3,990 (includes two custom transaction formats,

997 transaction set, and one communications module for one network)

Mainframe: \$9,500 - \$35,000

Additional Charge Per EDI Standard: None

Additional Charge Per Transaction Set: None

Annual Maintenance Fee: Microcomputer: \$600 - \$780; Mainframe: 15 percent

of list price

Maintenance Fee Includes: Hot line, software enhancements

Training Fee: \$500 per person per day

Additional Fees: Call vendor.

Networks Directly Accessed: GEIS; ORDERNET; Kleinschmidt; RAILINC; TranSettlements; Western Union; Sears; Control Data; Dialcom; IBM; Telecom

Canada; DATA PAC; CompuServe; AT&T; BT Tymnet

Vendor Experience

Year Company Founded: 1984

Date Package First Available: 1987

EDI Professional Staff Resources

Technical Staff: Not available

Hot Line: Varies

Total: 85

Miscellaneous Information: Vendor's EDI products are available to DoD activities through General Services Administration Contract #GS00KAGS5192.

Programming Language Used by Package: MicroFocus COBOL

Synergistic Systems, Inc.

Address: 442 North 3rd Street

Neptune Beach, FL 32233

Contact: Ron Meison

Phone: (904) 249-0201

Product: BIZIBOX

Hardware/Operating System Environment: IBM compatible PC, AT, 386, PS/2 with MS-DOS 3.3, 20MB hard disk, 1MB RAM

EDI Standards/Transaction Sets Supported: X12, TDCC (All transaction sets supported are "developed" on a customer request basis.)

Pricing:

Basic Package Cost:

\$1,895: Standalone system for PC or AT with one transaction set \$8,495: Flat file system for AT or 386, with six transaction sets

\$14,495: For 386 only, direct mapping from application data to standards,

includes all transaction sets

Additional Charge Per EDI Standard: None

Additional Charge Per Transaction Set: None

Annual Maintenance Fee: First 90 days are free, then 15 percent of purchase

cost

Maintenance Fee Includes: Standards updates, software enhancements,

customer support

Training Fee: Included in purchase price

Additional Fees: Not available

Networks Directly Accessed: IBM; Control Data; TranSettlements; GEIS; BT

Tymnet

Vendor Experience

Year Company Founded: 1986

Date Package First Available: 1988

EDI Professional Staff Resources

Technical Staff: 6 (maintenance only)

Hot Line: 2

Total: 7

Miscellaneous Information: Vendor specializes in distributed processing for mid- to

large-size computer systems.

Programming Language Used by Package: C

TSI International

Address: 45 Danbury Road

P. O. Box 840

Wilton, CT 06897-0840

Contact: Meg Murdock

Phone: (203) 761-8600

Product: TranSlate

Hardware/Operating System Environment: IBM compatible mainframes (DOS/VSE

or MVS); HP; DEC VAX; Unisys

EDI Standards/Transaction Sets Supported: X12, TDCC, VICS, WINS

Pricing:

Basic Package Cost:

DOS/VSE: \$30,000 MVS: \$35,000 Non-IBM: \$25,000

Additional Charge Per EDI Standard: None

Additional Charge Per Transaction Set: None

Annual Maintenance Fee: First year included in purchase price, then

15 percent of current list price

Maintenance Fee Includes: Hot line, software enhancements, standards

updates

Training Fee: \$300 per day per person at vendor site; \$1,000 per day plus

expenses at client site

Additional Fees: Not available

Networks Directly Accessed: GEIS; IBM; ORDERNET; BT Tymnet; Kleinschmidt;

RAILINC: TranSettlements; Western Union

Vendor Experience

Year Company Founded: 1967

Date Package First Available: 1982

EDI Professional Staff Resources

Technical Staff: 5

Hot Line: 4

Total: 8

Miscellaneous Information: Vendor acquired TranSettlements, Inc.'s, TranSlate EDI product in March 1990; it is currently developing a data mapping utility (Trading Partner) that requires no programming by the purchaser.

Programming Language Used by Package: ANSI 74 COBOL

Wright Systems, Inc.

Address: 14492 Sheldon Road, Suite 300

Plymouth, MI 48170

Contact: Dick Dressell

Phone: (800) 234-7253

(313) 459-7760

Product: Wright EDI

Hardware/Operating System Environment: IBM System 36, System 38, AS400

EDI Standards/Transaction Sets Supported: X12, WINS, VICS, TDCC, AIAG

Pricing:

Basic Package Cost:

System 36: \$4,000 System 38: \$7,000

AS400: \$6,000 - \$18,000

(Basic package includes translator, communications software, RJE communications, 997 transaction set, and two additional transaction sets.)

Additional Charge Per EDI Standard: None

Additional Charge Per Transaction Set: \$500

Annual Maintenance Fee: 18 percent of total current value of package; first

90 days are free.

Maintenance Fee Includes: Standards upgrades, software enhancements, hot-

line support

Training Fee: \$600 per day

Additional Fees: Vendor will program custom interfaces for \$75 per hour.

Networks Directly Accessed: IBM; GEIS; Control Data; Kleinschmidt; ORDERNET; BT Tymnet (Vendor will access additional networks as requested by a user; the cost will depend upon the user's requirements.)

Vendor Experience

Year Company Founded: 1977

Date Package First Available: 1987

EDI Professional Staff Resources

Technical Staff: 10

Hot Line: 4

Total: 18

Miscellaneous Information: Vendor's X12 experience is primarily in the automotive industry; vendor provides some consulting services.

Programming Language Used by Package: RPG

APPENDIX C

EDI TRANSLATION SOFTWARE FUNCTIONS AND FEATURES

Table C-1 identifies 48 functions and features that could be included in an EDI translation software package for three different operating environments: standalone microcomputer, front-end microcomputer, minicomputer, or mainframe. Those operating environments stem from an analysis of DoD's 152 largest CONUS shipping activities that generate Government bills of lading.

TABLE C-1
EDI TRANSLATION SOFTWARE REQUIREMENTS

| | Оре | erating enviro | nment |
|---|-------------|----------------|----------------------------|
| Function/feature | Stand-alone | Front-end | Minicomputer/ mainframe |
| Communications Features | | | |
| Communications Software | M | M | M |
| Transaction Set Consolidation Routines | M | M | М |
| Multiple Communications Interface | 0 | 0 | 0 |
| Network Identification Table | M | М | М |
| Unattended Operations Capability | M | _M | М |
| Systems Utilities Automatic Recovery/Restart Capability | M | M | М |
| Installation Routines | М | М | 0 |
| System Interface Routines Application System Interface | М | M | М |
| Data Input Screens | М | 0 | 0 |
| Input Editing | м | 0 | 0 |
| User-Defined Print Output | M | 0 | 0 |
| User-Definable System Interface | 0 | 0 | 0 |
| User-Defined Data Input Screens | 0 | 0 | 0 |
| Customized Operations Routines Code Conversion Capability | 0 | 0 | 0 |
| Data Element Delimiter Table | м | M | м |
| Functional Acknowledgment Capability | м | M | м |
| Multiple Header Support | м | М | M |
| Segment Terminator Table | М | M | м |
| Trading Partner Profile | 0 | M | M |
| Transaction Set Sequential Numbering | М | M | M |
| Version Support Table | М | M | м |
| Editing Features Character Conversion Capability | 0 | 0 | 0 |
| Inbound Standards Compliance Editing | М | M | М |
| Internal Codes Duplication Routine | M | 0 | 0 |
| Outbound Standards Compliance Editing | M | M | М |
| Transaction Set Correction Capability | м | 0 | o |

Note: M = mandatory; O = optional.

^{*} Pertinent to only those sites that will use point-to-point communications with one or more trading partners.

TABLE C-1

EDI TRANSLATION SOFTWARE REQUIREMENTS (Continued)

| | Оре | erating enviro | nment |
|--|-------------|----------------|----------------------------|
| Function/feature | Stand-alone | Front-end | Minicomputer/ mainframe |
| System Maintenance Routines | | | |
| Automated Purging | М | M | Wp |
| Expandability | M | М | M |
| Maintenance Support | M | M | M |
| Table-Driven Software Structure | M | M | М |
| Transaction Set Archiving | М | M | М |
| Version Support | M | M | М |
| Report Functions Error Reports | М | M | М |
| Functional Acknowledgment Reconciliation | М | M | M |
| Inbound Transaction Set Reporting | м | M | M |
| Outbound Transaction Set Reporting | M | M | M |
| Transmitted Characters | 0 | Ο | o |
| User-Defined Management Reports | 0 | 0 | o |
| Support Features Help Screens ^c | О | 0 | 0 |
| Technical Documentation | M | M | м |
| Training ^c | М | M | М |
| Tutorial Package ^c | 0 | 0 | o |
| User Documentation | J M | M | м |
| User Support (Hot Lines) | м | M | M |
| Miscellaneous Features Compatibility with Encryption and Authentication Packaged | 0 | 0 | 0 |
| Multiple Users | 0 | 0 | О |
| Selective Accessibility | м | M | o |
| System Entry Security | м | M | 0 |

Note: M = mandatory; O = optional.

⁶ Operating system utilities separate from the translation software package may fulfill this requirement.

^c Either training or the help screens and tutorial package is mandatory.

^d When the requirements for such a feature have been fully defined, we expect this feature will be mandatory for all operating environments.

APPENDIX D

SOFTWARE PRODUCT SURVEY RESULTS

This appendix presents the results of a telephone survey of EDI translation software vendors. The information obtained in that survey is categorized by the type of computer hardware required by the software package: microcomputer (Table D-1), minicomputer (Table D-2), or mainframe (Table D-3). We did not request detailed information for those features that all vendors typically claim are included in their software. For example, virtually all vendors claim their software is "table-driven" and includes "transaction set archiving." Instead, we focused on those features that we believe help to differentiate the various product offerings. To illustrate: although user-defined management reports are not required by any of the operating environments, we believe that feature is very useful and not offered by all vendors.

TABLE D-1. MICROCOMPUTER TRANSLATION SOFTWARE SURVEY

| ### COUNTY | 5.70 \$ 8 17 18 5 F | | | | | | | | | | | | | |
|--|--|--|----------|---------------------------------------|-------------------------------|--|-------------------------------|-----------------------------------|---|---|------------------------------|---|---|------------------------------|
| | | 1888 |) g | o _N | | Ę | ş. | Q | Ě | 9 | ON. | No V | £ × | ž, |
| The part of the pa | | E & 23 8 | 2 | ş | ID and Password | Password | ID and Password | Password | Password | ON. | No | No | Password | Yes |
| | Today. | To see I | 2 | Ē | Š | Yes & | Ě | Yes 11 | × × | ×ex | Y. | Yes | Yes | No23 |
| | LEGISTIEN. | 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 | È | ž | Š | Ě | ×es | Yes | Yes ¹³ | Yes | Yes ¹³ | Yes ¹³ | ۲es | ۲. |
| | | The state of the s | ş | 2 | Yes | ž | No | Yes | Yes | Yes | No | No | Yes | No |
| THE TOTAL OF THE PARTY OF THE TOTAL OF THE PARTY OF THE P | The state of the s | 48 | ş | 2 | Š | Š | No | No | No | 91 ^{ON} | No | Yes | Yes | Yes |
| THE TOTAL TO | | 1 200 | <u>8</u> | No3 | , Ç | Yes | Yes | No3 | Yes | Yes | No | Yes | Yes | Yes |
| THE TOTAL OF THE PROPERTY OF THE TOTAL OF THE PROPERTY OF THE TOTAL OF | De Stopp | SPS TO BE THE | Š | 48 | Yes5 | ~; | 765 | 785 | Yes ⁵ | Yes | Yes 18 | Yes ⁵ | Yes22 | Yess |
| THE TOTAL TO | Trude of the | 1,60/ | Ĕ | Y. | Yes ⁵ | Yes ^{2.7} | Yes ⁵ | Yes | Yes | Yes | Yes ⁵ | Yes | Yes5 | Yes |
| THE TOTAL OF THE PROPERTY OF T | | 1 2 5 1 | Yes. | Š | Y | Yes | Oł ON | Yes | Yes | Yes | No | Yes ¹⁹ | Yes | Yes ²⁴ |
| THE TODUCY OF THE PART OF THE | | 1 252 | ş | Yes. ² | Yes ² | Yes² | Yes | Yes | Yes² | Yes | Yes | Yes | Yes² | X X |
| THE TODOLOGY THE TOTAL STATE OF THE STATE OF | LES STEPLY | / CD / | ş | Ş | ž | Yes | Yes | Yes | Yes² | Yes 15 | Yes | res ² | Yes | £ |
| 100000 | | G _{ROJ} A | ٤ | ĝ | Ye. | Yes | ۲œ | Yes | Yes | No 14 | Yes | No 14 | | Ş, |
| | TOTA SELINE | 129 | È | Ē | 2 | , s | Yes | Yes | 783 | Yes | Yes | Yes | Yes 20, 21 | No23 |
| | 100 | The state of the s | ş | È | ₽ | Yes | Yes | Yes | Yes.12 | Ye | Yes | Yes | Yes | No33 |
| DUR TURO! | | A ST | ş | ş | , a | ž | ş | Yes | ₩ | \$ | Yes ¹⁷ | ş | ۲ ۲ | , s |
| Advanced Communications System ACSPCX 12 American Business Computer FDE-FC ED-F accierC and ED-F accirum American Custom Software, Inc. Business Partner Translator (BPT) The APL Group Inc. Bu | (a) | | ٤ | È | ě | ž | 7e3 | Yes | Yes | Y. | Yes | 78 | Yes | Yes |
| | | THE RUEDINGS | | Limerican Business Computer FDE-PC | EDI-EACEVITY and EDI-EACEVITY | Limerican Custom Software, Inc. Business Partner Translator (8PT) | The APL Group Inc. QualED! | iaggarly & Assections *EDI*FOCUS* | iell Atlantic Intellitrade and intellitrade Plus | braingken Computer Group, Inc. D15 and F15 | AM-AM Tech Inc. E-2 Order | cannel Date Corporation NEDI-FLATFILE and NEDI-MICRO | bata Dispatch Carporation EDisynapse | MGT Seftware, Inc. MacEDI |

- Trading partners must be set up by vendor.
- May be specified for each transaction set used by a trading partner.
 - Nonautomated; available via menu selection or "pull-up window."
 - Supports the EDIFACT header UNA/UNB.
 - Data element codes are also validated.
- Will sell a turnkey informix solution (SQL or report writer) or provide interface to
- another system.
- Parameter driven; optional Can be defined by the user.
- Must be set up every day.
- Help messages can be defined by the user for each data element in each transaction set Cannot be specified for each trading partner.
 - used by a particular trading partner.
 - Requires vendor assistance
- Toll-free 800 number. 2
- BG header is not supported; TDCC is not supported. 2
- Each transaction set type is not individually numbered. 3
- Reports the number of blocks transmitted by the modem.
 - Performed by vendor.
- Erroneous transactions are received and flagged in a report.
 - Available for an additional fee
- Compliance editing occurs after input screen has been completed.
- Limited field-by-field editing; user can also override the standards on a field basis.
 - Accepts erroneous transactions. User manually determines if transaction is

acceptable

In development. 23

z

- Requires a different map for each affected trading partner's transaction
- Specific data element editing requirements can be specified for each trading partner
 - Only checks header controls on inbound transactions

2

- Checks only the interchange envelope and functional group headers; permits nonstandard transactions to be sent and received
 - Reports the number of transaction sets sent by each trading partner
- User-specified dates may be overridden.
- Nonautomated; requires use of system editor.
- Reports the number of bytes sent for each transaction set; the number of bytes per network is not reported. 8 5
- In Beta Test mode.
- Interchange control checking only 35 33
- Only once per day.
- Records are purged during the archiving process 33
- Transaction sets are numbered only by functional group or by network Supported by Harbinger's network 32
 - Data bases are automatically encrypted
- Depends upon the transaction sets in use by the trading partner.
 - Requires knowledge of EDI standards.
- Loops within transaction sets are not validated for compliance with the

TABLE D-1. MICROCOMPUTER TRANSLATION SOFTWARE SURVEY (CONTINUED)

| | \ | | | ļ | Sign | | | | 1 | | | | | | | | | | | | |
|--|---------------|--|--|--|--|-------------|---|-------|--------|--------------------|--|------------------|-----------|---|--|--|----------------------------|----------------|---------------------------------------|-------------|---|
| | TO TO A DIE | ions. | V | Talig | Qie in | <i>"</i> ም | COSE ONLY | | | Post of the second | Posto of the state | | /, | G _{IIR} | Cartilly. | SOLETON OF THE PARTY OF THE PAR | Slote | A CANGE | Lodding 7 | STOS BITTLE | |
| duos | TUB | A STATE OF THE STA | The state of the s | 14 to 18 18 18 18 18 18 18 18 18 18 18 18 18 | 12 18 | G. S. T. T. | 8 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 | 1000 | 1 3 3 | 1 7.40 | 1 4 % | 1 3 4 | \ 4,8,\ | 9 1 8 1 8 1 8 1 8 1 8 1 8 1 8 1 8 1 8 1 | The state of the s | 40 80 70 | 1 83g | CHI THE | eville. | | / |
| DNS Assectess, Inc. EDsEdge | ۶ | \ | 1 1 1 1 | 4 | 1 | 1 5 | ا الله | (5 | . 1 5 | \ I > | | | . 19 | 5/ | | | ≤ 1 | 1 | id | | |
| Dynamic Busines Systems | É | Ě | + | -} | V 23.70 | Ē | Ę | 7.5 | £ \$ | <u> </u> | No. | 1_ | _ | ž | | È | Password | Ě | · · · · · · · · · · · · · · · · · · · | | |
| EDI, Inc. FELMK | re. | \$ | , <u>s</u> | ╁ | Ě | Ē | † g | Ĩ | 2 | | È . | ~}- | SO S | 2 | re. | Ě | ٤ | 9 | | | |
| Electronic Data Systems EDr'Assert | È | ž | , | + | ě | ┪— | , E. 33 | | 3 | وَ ﴿ | E ' | Şo ¥ | No.28. 31 | ≥ | Ē | No32 | Password 19 Encryptn 19 | 4 × es 19 | | | |
| Faretal Carp. | Ě | È | ۶ | + | 2 | +- | | | | ġ , | È | Ē | ě | ٤ | ž. | ž | ě | No. | | | |
| General Electric Information Services EDI*PC | ž. | 3 | +- | +- | +- | | + | £ 7 | ž , | È, | è | Ē | È | Ě | È | ě | ID and Password | Š | | | |
| Greco Computer Resources, Inc. EQL Wase | \ \frac{1}{5} | F | + | + | | + | + | | 2 | È | χ. Υ. | ž _o ž | No.28 | ž | è | ě | Password | No. | | | |
| Harbinger*EDI Services | + | V = 19.32 | - [| + | | | + | , j | ٤ | | Yes5 | ٤ | Ŷ | ş | ž | È | ON. | N _O | | | |
| Membershap Busines Machines Datables (hance) | + | Ě | - [| Ç g | i i | | | ,e | Ě | . | Yes5.22 | Ě | Ş | ş | ž. | È | Encrypted Passwords | NO | | | |
| LER Product Merketing Company, Inc. | } } | 1 3 | 1 | | + | +- | + | ē | ٤ | Ē | Ě | ٤ | Yes.28 | Ě | Ě | è | č, | ¥. | | | |
| Uleyd Bush, Inc. | + | | | 2 | | + | ξ | ž | ž | Ş. | Yess | No | No | 8 | Ě | Š | 8 | Š | | | |
| K-Change | ٤ | 2 | ě | No.20 | No 14 | | No37 Y | 76. | ş | ž | Yes | £ | No28 | Ş | Ě | ۶ | No. | No | | | |

.

•

- Trading partners must be set up by vendor.
- May be specified for each transaction set used by a trading partner.
- Nonautomated; available via menu selection or "pull-up window."
 - Supports the EDIFACT header UNA/UNB.
 - Data element codes are also validated.
- Will sell a turnkey informix solution (SQL or report writer) or provide interface to

another system.

- Parameter driven; optional.
- Can be defined by the user.
 - Must be set up every day.
- Cannot be specified for each trading partner.
- Help messages can be defined by the user for each data element in each transaction set used by a particular trading partner.
 - Requires vendor assistance. 2 2 3
 - Toll-free 800 number.
- BG header is not supported; TDCC is not supported.
- Each transaction set type is not individually numbered.

2

- Reports the number of blocks transmitted by the modem. 2
 - Performed by vendor. 2
- Erroneous transactions are received and flagged in a report. : :
 - Available for an additional fee.
- Compliance editing occurs after input screen has been completed.
- Limited field-by-field editing; user can also override the standards on a field basis. Accepts erroneous transactions. User manually determines if transaction is 2 . 2

- 23 In development.
- Requires a different map for each affected trading partner's transaction
- Specific data element editing requirements can be specified for each trading partner.

2

- Only checks header controls on inbound transactions % %
- Checks only the interchange envelope and functional group headers;
 - permits nonstandard transactions to be sent and received.
- Reports the number of transaction sets sent by each trading partner. User-specified dates may be overridden.

2

- Nonautomated; requires use of system editor.
- Reports the number of bytes sent for each transaction set; the number of bytes per network is not reported. 2 2 =
 - In Beta Test mode.

~

- Interchange control checking only. 33
- Only once per day ጁ
- Records are purged during the archiving process. 33
- Transaction sets are numbered only by functional group or by network Supported by Harbinger's network. 9
 - Data bases are automatically encrypted.
- Depends upon the transaction sets in use by the trading partner
 - Requires knowledge of EDI standards.
- Loops within transaction sets are not validated for compliance with the

acceptable

TABLE D-1. MICROCOMPUTER TRANSLATION SOFTWARE SURVEY (CONTINUED)

| | | | | | 8 | | | | | | | | | | | | | | |
|---|----------------|--|--|--|--------|-------------------|------------------|----------|-------------------|--|----------------|-------------------|----------------|---------------|-------------|---------------------------------------|---------------------------------------|------------|----------------|
| ADDOLA DIL | JOHO P. | ć. | 3 | ion service in the se | | Legister Commence | | | Paridology of | Destron | | G _{HB} ; | | ed alegan | S. LODBE | s. | Lodding . | | Stort Interior |
| Autouro | | E. A. S. | Salaria de la companya de la company | 18.68 | J. Way | \ \@\mathrea{m}\ | 10'60,764 | 1 7 7 8 | 1 (00) | Colin State of the | 1 4 4 4 | 22 | O Tallage Tall | California de | Lagger, lag | * * * * * * * * * * * * * * * * * * * | THE THE S | Priliting. | |
| MAXXUS, Inc. MAXX*EDI | ě | , es , | Ě | è | è | , s | \ | l § | | ۽ | | 1 2 | ٤ | غ ا | È | \ e ge | \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ | | |
| MAXX*EDI-Entry | ON. | No. | £ | ه. ا | ž | ž | Yes | Š | ž | ž | , kes | | , es | ×8 | ۶, | Password 20 | | | |
| MAXX*TRANSLATOR | ş | res ¹⁷ | Yes | Y 8 | % ≺ | ž | Yes | , es | ž | Š | × | Š | Ē | ¥8 | ě | Password of ID and | | | |
| Perwill Inc. Perwill ED: | ۶۵ ۲ | 763 | ř | Yes20 | ž, | ž | ž | È | Yess | Yes5 | ě | ě | ž | È | ž | Yes Yes | Š | | |
| Piedmont Systems, Inc. TEL-EDI | , Yes | Yes | Ě | o _N | ž | ř | , s | Yes.24 | , es5 | YesS | Š | 7es28 | ŝ | ě | ş | Password | Š | | |
| RMS, Inc. RMS VLT | X G | Yes19 | £ | 7es ²⁵ | ž | È | Yes2 | Yes.25 | Yes.25 | ě | ₹ ₀ | 2 | ş | ž | È | fD and | Š | | |
| St. Paul Software Interconn | Yes | Š | , Y | ۲ ۲ | £ | Yes2 | , s | È | Š | ş | Š | 2 | ě | È | ž | Password | 2 | | |
| Sterling Saftware Micro*Trans | N _O | Ş | ž | Yes. | Ě | ž | 7.5 | o ž | ě | ş | 2 | ٤ | ş | ves 13 | È | tD and | 2 2 | | |
| Qukk*Iran and Pro*Iran | No | ON. | Ĕ | Š | ž | Š | , s | £ | Yes ⁵ | Yes5 | š | 2 | ò | ž | ě | ID and | 0 | | |
| Supply Tech, Inc. 51x12 | Y @\$ | ON | Š | Yes 25. 27 | ž | Yes2 | Yes ² | Yes.39 Y | res25.27 | ĝ | è | No28 | Ş. | Š | Yes 8 | 73 X34 | Ž, | | |
| Synergistic Systems, Inc. 812-1-801 | , | ¥3 | ě | Yes | ž | Yes? | Yes2 | Yes.40 | Yes ⁴¹ | Yes5 | ě | S _S | Ş. | ě | ě | ž | ş | | |
| Telecommunications Interface Corp. 5DIS | ě | ě | ě | × × | ž | È | Yes. | Ē | že, | , es | ٤ | ٤ | 8 | res 13 | ě | Ş | ٤ | | |
| | | | | | 1 | 1 | 1 | 1 | 1 | | | | | | | | - | | |

- Trading partners must be set up by vendor.
- May be specified for each transaction set used by a trading partner.
- Nonautomated; available via menu selection or "pull-up window."
 - Supports the EDIFACT header UNA/UNB.
 - Data element codes are also validated.
- Will sell a turnkey Informix solution (SQL or report writer) or provide interface to
 - Parameter driven; optional another system.
 - Can be defined by the user.
 - Must be set up every day.
- Help messages can be defined by the user for each data element in each transaction set 10 Cannot be specified for each trading partner.
 - used by a particular trading partner. Requires vendor assistance.
 - Toll-free 800 number.
- BG header is not supported; TDCC is not supported.
- Each transaction set type is not individually numbered.
- Reports the number of blocks transmitted by the modem.
 - Performed by vendor.
- Erroneous transactions are received and flagged in a report.
 - Available for an additional fee.
- Compliance editing occurs after input screen has been completed.
- Limited field-by-field editing; user can also override the standards on a field basis. Accepts erroneous transactions. User manually determines if transaction is

- In development.
- Requires a different map for each affected trading partner's transaction 2
- Specific data element editing requirements can be specified for each
 - Only checks header controls on inbound transactions. trading partner.
- Checks only the interchange envelope and functional group headers; permits nonstandard transactions to be sent and received
 - Reports the number of transaction sets sent by each trading partner.
 - User-specified dates may be overridden.

ź

8

- Nonautomated; requires use of system editor.
- Reports the number of bytes sent for each transaction set; the number of bytes per network is not reported. =
 - In Beta Test mode.
- Interchange control checking only.

33

2

- Only once per day. ž
- Records are purged during the archiving process. 32
 - Supported by Harbinger's network 8
- Transaction sets are numbered only by functional group or by network. 3
 - Depends upon the transaction sets in use by the trading partner Data bases are automatically encrypted.
 - Requires knowledge of EDI standards.
- Loops within transaction sets are not validated for compliance with the

acceptable

TABLE D-2. MINICOMPUTER TRANSLATION SOFTWARE SURVEY

| Ver. 11.18 Nua Nua Ver. 5 Ver. 5 |
|--|
| N/A N/A Yes |
| Yes |
| Yes |
| No No Yes Yes Yes Yes Yes Yes Yes No No No Yes No No |
| |

- Also indicates the number of segments transmitted; Ordernet's network bills by the number of segments sent.
 - May be specified for each transaction set used by a trading partner.
- Data element codes are also validated.
- Reports the number of transaction sets sent by each trading partner.
 - Supports the EDIFACT header UNA/UNB.
- Requires vendor assistance.
- Will provide interface to another data base or sell user a turnkey informix solution (SQL or report writer)
- Compliance editing occurs after input screen has been completed
 - BG header is not supported; TDCC is not supported.
 - Only available on the HP3000.
- Available for an additional fee.
- User may add or delete codes for each trading partner ~
 - User-specified dates may be overridden. 2
- Nonautomated; requires use of system editor. Ī
- Nonautomated; available via menu selection or "pull-up window."
- Reports the number of bytes sent for each transaction set; the number of bytes per network is not reported.

- "Batch" mode only
- Requires purchase of data mapping product (EDImap).
 - Source code for menus and reports is provided.
- Compliance editing occurs after input screen has been completed
- Limited editing.

2

- Records are purged during archiving process.
 - Toll-free 800 telephone number.
- Requires a different map for each affected trading partner's transaction 2 2
- Only outbound transmissions are numbered.

2 %

82

- Specific data element editing requirements can be specified for each User can control the level of checking for each trading partner. Can be customized by user.
- "Rejected" transaction sets can be optionally accepted trading partner.
 - Only once per day.
- Available upon user request. Limited screens are available
- Data dictionary is supplied for use with a report generator; suggest purchasing IBM's "Query" product.

TABLE D-2. MINICOMPUTER TRANSLATION SOFTWARE SURVEY (CONTINUED)

| *TO SEITHER | | | | | | | | | | | |
|---------------------|--|-------------------|-------------------|----------------------------------|---|----------------------|-------------------------------|----------------------------------|------------------------------|-----------------------|------------------------------------|
| Neg Silv | | | | | | | | | | | |
| 15 BUDD. | * (I.A. 18 4 32) | | | r - | | | | | | | |
| Jodge J | THE THE STATE OF THE PARTY OF T | ¥ | Ē | Æ | ક્ | Yes | No | Š | ě | Yes | , Y |
| 8. | West Clay | Yes | Yes | Password | Password | ID and Password | NO | ID and Password | 1D and Password | 1D and Password | £ |
| SHOOBL | L'OG SELT LO | Yes | No | S. | Yes27 | Yes | Yes | No | Yes | Yes | Yes |
| 83.83.84 4.85.55 | Palida L | Yes ²³ | Yes | ž | , ₹ | Yes | Yes | Yes ²³ | res ²³ | 7es ²³ | Yes |
| | Site State | ON | Yes | ON. | NO | No | Yes | ON. | Yes | res ¹⁷ | No 19, 32 |
| G _{III} O3 | 4.2 | 59 k | Yes | ves ⁴ | ON O | No | No | Yes¹ | <u>8</u> | Yes | No4 |
| | \ 3°4 \ | No ²² | SION | Yes | Yes | SION | səλ | Yes | 2 | Yes | Yes |
| Sand Sand | Signal Si | Yes | £83 | Yes³ | 7es ²⁶ | Yes | Yes | £ ⁸⁹ λ | Yes ²⁹ | Yes ^{3, 29} | ¥8 |
| OST OF BOOK | 1 80 | Yes | Yes ³ | Yes ³ | Yes | Yes ^{2k} | Yes | ۲ ده | Š | Yes ³ | Yes ² |
| | 1 24 26 | Yes | Yes | Yes ²⁴ | Yes ²⁴ | Yes | Yes | Yes | Yes 14, 28 | 7es ⁶ . 28 | Se . |
| | 10.476 | , tes | Yes | Yes² | Yes | Yes ² | Yes? | , tay | Yes | Yes² | 765 |
| Libje Kally | / C. A. / | 765 | Yes | Yes | 52°N | Yes | Yes ² | Yes | ž | Yes | N _O |
| | 1 24 | Yes | Yes | Yes | Yes | Yes | Yes | Yes ⁵ | , s | Yes | Yes |
| SION SETTINGS | 1 25 | V/N | 7es ²⁰ | No | No | N/A | WA | N/A | A.A. | N/A | No |
| 180 | STEEL | N/A | SA, | 19 A | No 11 | NA | NA | VN | 43 | NA | Yes ³¹ |
| | Control of the Contro | No | Yes | Yes | Yes | Yes ¹¹ | Yes | Yes | Š | Š | No |
| ONDON | | Yes | Yes | Yes | Yes | Yes | Yes | , v | Yes, | \$ | Yes,30 |
| | No. ALEGINOS | hemel | 103 ₀ | Nedment Systems, Inc. TEL-EDI | Redley Business Computers, Inc. R-E Di | .1 | software | Stariing Seitware GENTAAN 400 | Translator 36, *38, and *4XX | Translator*DG | Weight Systems, Inc. Wright EDI |
| | | MENACT | D-1 | | a-EO | MAS, Inc. MAS VLT | St. Paul Software Datatran | Starting | Tramsk | Transk | Wright System Wright EDI |

- Also indicates the number of segments transmitted; Ordernet's network bills by the number of segments sent.
 - May be specified for each transaction set used by a trading partner.
 - Data element codes are also validated.
- Reports the number of transaction sets sent by each trading partner
 - Supports the EDIFACT header UNA/UNB.
- Requires vendor assistance.
- Will provide interface to another data base or sell user a turnkey Informix solution (SQL or report writer).
 - Compliance editing occurs after input screen has been completed.
 - BG header is not supported; TDCC is not supported.
 - Only available on the HP3000.
- Available for an additional fee.
- User may add or delete codes for each trading partner ~
 - User-specified dates may be overridden
- Nonautomated; requires use of system editor. I
- Nonautomated; available via menu selection or "pull-up window."
- Reports the number of bytes sent for each transaction set; the number of bytes per network is not reported.

- "Batch" mode only.
- Requires purchase of data mapping product (EDImap)
 - Source code for menus and reports is provided.
- Compliance editing occurs after input screen has been completed.
 - Limited editing.
- Records are purged during archiving process.
 - Toll-free 800 telephone number.

2

- Requires a different map for each affected trading partner's transaction z
- Only outbound transmissions are numbered.

22

- User can control the level of checking for each trading partner.
- Can be customized by user.
- trading partner.
- Specific data element editing requirements can be specified for each
- "Rejected" transaction sets can be optionally accepted.
 - Only once per day.
- Available upon user request. Limited screens are available.
- Data dictionary is supplied for use with a report generator; suggest purchasing IBM's "Query" product.

TABLE D-3. MAINFRAME TRANSLATION SOFTWARE SURVEY

| | ` | | | | | | | | | | | | | | | | | | | |
|----------|--|--------|--|--|---|----------|--|-------|-----------|--|---|-------|-------------|---------------------|--|--------------------|--------------------|----------|------------|--|
| | SONDOLO PILE | JOO TO | 4 5 | 13 | S.O. S. B. T. R. B. | Es es | List State | | | Son State of the s | Stall Stall | | Giller) | | estate allen | SUODEL | SE. | today, | 1 | ************************************** |
| • | AUROLIOS | | To Be Service Best of the service of | ENTERING TO SERVICE TO | 1 28 | 1 34 | <i> </i> ' S -37' | 16.65 | 188 | | Salar | 1 3 4 | 188 | THE TOP IN | \\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\ | Tage of the second | To Sale | CELLER ! | A STATE OF | |
| | American Business Computer XLT12 | ş | ٤ | ¥ | ¥. | Į. | _\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\ | L | 1 5 | | | | | $\int_{\mathbb{T}}$ | | | | | | |
| | Control Data Corporation RED-INANSLATOR and RED-EXCHANGE | È | , e | ¥ ¥ | § | 7 | Ę | Ě | È | ^es, | ž | Ě | ž ž | ş ş | ž ž | S & | Yes 1 | § 2 | | |
| D-1 | EDitran | Z. | ves!.6 | ş | ž | 7 5 | ř | Y 483 | , 48.6 | Yes. | , se | ş | 6 0N | 602 | | , | | | | |
| 2 | Constal Electric Indermedian Services EDi*Central | È | Yes 10 | ž | ₹ Ž | ~s | ž | Yes3 | Ě | , ž | , SA | ž | e g | 11.62% | | ۽ اع | E, | ş | | |
| | International Business Mechines Detainterchangefürvs | Yes 14 | ž | Š | ş | ž | ž | ž | SI MY | , | , | ; | | | <u> </u> | £ | Ş. | ş | | |
| 4 | St. Paul Software Detection | Yes | \$ | ¥ | A/A | ž | Yes3 | , des | | <u> </u> | g , | £ , | 2 . | ž | S , | ě | S, | ž | | |
| | Sterling Software | ve.16 | Š | ş | N N | 7, | 5.23 | 7 | | | <u> </u> | Ē : | g | È | Ě | ě | Password | è | | |
| | Translator*MVS and Translator*VSE | Ē | Ş | WA | N/A | ě | ğ ğ | ž ž | 75.18 | ğ ğ | Yez/.19 | ž ž | _e | 2 3 | 21 27 27 | | O and Password | ē | | |
| <u> </u> | TSI International Translate | ž ž | ş | N/A | NA | , kg | ř | , E | ř | ž | , je | į | } | | <u>.</u> 3 | + | Password ID and | o Z | | |
| I | Available for an additional fee. | | | | | | | 7= | | | | | | | <u> </u> | ٤ | Password | ě | | |

Supports the EDIFACT header UNAVUNG.

May be specified for each transaction set used by a trading partner. User may add or delete codes for each trading partner.

"Batch" mode only.

Requires purchase of data mapping product (EDImap). Data element codes are also validated.

Reports the number of transaction sets sent by each trading partner. Source code for menus and reports is provided.

A shell written in COBOL is provided; programmer must complete the PROCEDURE division.

11 Requires a report writer.
12 Toll-free 800 telephone number.
13 For CICS portion only.
14 Requires the use of operating system utilities.
15 Specific data element editing requirements can be specified for each trading partner.
16 Only in GENTAAN Plus, may be set up by transaction set, trading partner, or network.
17 Also indicates number of segments transmitted; Ordernet's network bills by the number of segments sent.
18 Nonautomated; requires use of system editor.
19 Rejected* transaction sets can be continuely accessed.

Nonautomated; requires use of system editor "Rejected" transaction sets can be optionally accepted

APPENDIX E

SELECTING EDI TRANSLATION SOFTWARE

This appendix discusses how this guide can be used to aid in the selection of EDI translation software for Military Department or Defense agency activities. A step-by-step procedure for selecting EDI translation software for a particular activity follows:

- Identify the activity's EDI data processing requirements, including the application system that will be integrated with the EDI translation software.
- Identify the hardware and corresponding operating system upon which the EDI software will reside. Categorize the hardware as microcomputer, minicomputer, or mainframe and determine the EDI translation software requirements for a specific activity. Use Appendix C to identify the functions and features required by the EDI translation software package for the specific operating environment.
- Use Appendix A to identify those vendors that sell software for the desired hardware environment (microcomputer, minicomputer, or mainframe).
- Use Appendix B to look up the detailed software product offerings and descriptions for those vendors identified in the previous step. Identify those vendor products that offer EDI translation software for the required hardware and operating system.
- Determine if the products identified in the previous step satisfy the activity's major EDI translation software requirements by using Appendix D, Software Product Survey Results.

In most cases, more than one product will meet an activity's requirements. We then suggest that product literature be requested from those vendors and, procurement rules permitting, we also advise a product demonstration. If only one product meets an activity's requirements, we recommend that a test copy be obtained and tested on the system that is to become EDI capable.